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The World of Organic Agriculture Statistics and Emerging Trends 2023

Edited by

Helga Willer, Bernhard Schlatter and Jan Trávníček

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Glossary

€/person: Per capita consumption in euros
AfrONet: African Organic Network
AMI: Agrarmarkt-Informationsgesellschaft - Agricultural Market Information Company, Germany
AU/AUC: African Union /African Union Commission
CAP: Common Agricultural Policy of the European Union
CAADP: Comprehensive Africa Agriculture Development Programme
CIAO: Comisión Interamericana de Agricultura Orgánica/ Inter-American Commission for Organic Agriculture
CIHEAM: Centre international de hautes études agronomiques méditerranéennes/ International Centre for Advanced Mediterranean Agronomic Studies
COTA: Canada Organic Trade Association
CPC: Candidates and Potential Candidates for the European Union
CSC: Continental Steering Committee of the Ecological Organic Agriculture Initiative for Africa (EOA-I)
EFTA: European Free Trade Association
EOA: Ecological Organic Agriculture
EOA-I: Ecological Organic Agriculture Initiative for Africa
EU: European Union
EU27: Member countries of the European Union from 2020 onward
Eurostat: Statistical office of the European Union, Luxembourg
FAO: Food and Agriculture Organisation of the United Nations
FAOSTAT: Statistics Division of FAO, the Food and Agriculture Organisation of the United Nations
FiBL: Forschungsinstitut für biologischen Landbau – Research Institute of Organic Agriculture, Switzerland
GATS: Global Agricultural Trade System of the Foreign Agricultural Service (FAS) of the United States Department of Agriculture (USDA)
GIZ: Deutsche Gesellschaft für Internationale Zusammenarbeit/German Agency for International Cooperation
GOTS: Global Organic Textile Standard
ha: Hectares
Horizon 2020: Research and Innovation Programme of the European Union, running from 2014 to 2020
Horizon Europe: Research and Innovation Programme of the European Union, running from 2021
HS codes: Harmonized System Codes
ISOFAR: International Society of Organic Agriculture Research
IFOAM – Organics International: Formerly International Federation of Organic Agriculture Movements (IFOAM)
ITC: International Trade Centre, Switzerland
MOAN: Mediterranean Organic Agriculture Network hosted by CIHEAM Bari, Italy
MT: Metric tons
NOARA: Network of Organic Agriculture Researchers in Africa
OTA: Organic Trade Association, United States of America
Power BI: Interactive data visualization software product developed by Microsoft for business intelligence
PGS: Participatory Guarantee Systems
POETcom: Pacific Organic and Ethical Trade Community
SECO: State Secretariat for Economic Affairs, Switzerland
SÖL: Stiftung Ökologie & Landbau – Foundation Ecology & Agriculture, Germany
TP Organics: European Technology Platform for Organic Food and Farming
TRACES: TRAde Control and Expert System The European Commission's online platform for sanitary and phytosanitary certification required for EU imports
U.S.: United States
USDA: United States Department of Agriculture

Foreword from SECO

In the dynamic field of organic agriculture, access to good quality data on organic farming helps to measure success toward achieving the Sustainable Development Goals and serves as a resource for sound analysis and informed decision-making by researchers, policymakers, industry actors and other stakeholders along the whole value chain. Data can also support the development of a favourable policy environment, reliable regulations and standards, as well as transparency in the organic sector.

This report, which looks at the consolidated data from 2021, shows that once again, increasing demand for organic products stimulated growth in the organic sector, with organic food sales reaching the 125 billion euro mark. Growth was recorded in many advanced markets for organic products. The production side is also keeping pace: the latest data shows that organic farmland grew in many countries, and the total organic area increased to more than 76 million hectares, representing 1.6 percent of agricultural land worldwide, managed by more than three million producers. Consumer demand for organic foods increased substantially during the COVID-19 pandemic. Evidence shows that this trend continued in 2021 as retail sales have risen, albeit not at the same rate as during the initial period of the pandemic.

Of course, the development of organic markets and production is likely to be affected by global challenges such as the energy and inflation crises as well as the repercussions of the war in Ukraine. Once the data for 2022 becomes available, it will become apparent to what extent organic may be impacted by these factors.

The Swiss State Secretariat for Economic Affairs wants to help actors in the international organic industry to navigate these and other challenges and seize opportunities for the benefit of all. By supporting dynamic and easy access to organic market and production data, we thus aim to offer a global public good in support of decision-makers in governmental administrations, the private sector, development agencies, NGOs, and the private sector.

Dr. Monica Rubiolo
Head of the Division for Trade Promotion
Swiss State Secretariat for Economic Affairs (SECO)
Bern, Switzerland

Foreword from FiBL and IFOAM – Organics International

With the 24th edition, FiBL and IFOAM – Organics International proudly present a new edition of "The World of Organic Agriculture."

Data collection is a major and constant concern of the Research Institute of Organic Agriculture FiBL and IFOAM – Organics International. The comprehensive data provided over more than two decades in this publication serves as an important tool for stakeholders, policymakers, authorities, the industry, as well as researchers and extension professionals. It has also proven useful for development programs and supporting strategies for organic agriculture and markets and crucial for monitoring the impact of these activities. The publication also shows our ongoing engagement with transparency in the organic sector; the method of collecting the data has been refined over time to reflect the global status of organic as much as possible. "The World of Organic Agriculture" has become one of the most frequently quoted pieces of literature in scientific, technical, and descriptive articles and reports on organic agriculture.

This publication also demonstrates the contribution of organic agriculture to overarching sustainability strategies like the Sustainable Development Goals and the European Union's Farm to Fork Strategy.

Given that organic agriculture contributes substantially to all of the goals and strategies, this book not only shows the land area, number of producers and market figures; it also highlights the contribution of organic agriculture to tackling climate change, ensuring food and nutrition security, halting biodiversity loss, and promoting sustainable consumption and therewith its contribution to transforming food systems as a whole. Overall, "The World of Organic Agriculture" shows the potential of organic farming to contribute to a sustainable future!

We are grateful to the Swiss State Secretariat for Economic Affairs (SECO), the Coop Sustainability Fund and Nürnberg Messe for supporting this publication. We would like to express our thanks to all authors and data providers for contributing in-depth information and figures on their region, their country, or their field of expertise.

Lastly, we would like to thank the editorial team for their dedication and engagement, and we would also like to express our thanks to the other members of the FiBL team who support the activities surrounding the data collection.

Frick and Bonn, February 2023

Prof. Dr. Knut Schmidtke
Director of Research, Extension and Innovation
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Frick, Switzerland

Marco Schlüter
Interim Executive Director
IFOAM – Organics International
Bonn, Germany

Foreword from the Editors

In the 24th edition of "The World of Organic Agriculture", we present the latest available data on organic agriculture worldwide.

Again, many experts have provided valuable data. We are very grateful to all those who supplied data and information from all over the world and our supporters: the Swiss State Secretariat for Economic Affairs, the Coop Sustainability Fund, Nürnberg Messe and IFOAM – Organics International.

Furthermore, for this edition, the data collection efforts were supported as part of the European Union- and Switzerland-funded project Organictargets4EU (European data) and the GIZ project Knowledge Centres for Organic Agriculture in Africa (African data).

Knowledgeable authors once again contributed articles about their regions or fields of expertise, including the global market report, policy support, public standards and legislation, Participatory Guarantee Systems, organic cotton and the European Union's organic import data. Furthermore, in addition to our regional reports, we received country reports for Kenya and Ukraine.

As a new addition, we have integrated the EU and US import data into our global and regional statistical analyses. We have also changed the structure of the regional chapters by adding an overview of key indicators: Area, producers, retail sales and international trade.

For this edition, we further developed the Power Bi graphics, and most of the figures in this book are now based on Power BI, allowing fast updates in the future. In addition, you can explore our interactive Power BI graphics and database at https://statistics.fibl.org.

Finally, we are happy to announce that the Chinese edition of "The World of Organic Agriculture" will be published for the 12th time by the Organic and Beyond Company.

Helga Willer, Bernhard Schlatter and Jan Trávníček

Research Institute of Organic Agriculture FiBL, Frick, Switzerland

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Organic Agriculture: Key Indicators and Top Countries

Indicator	World	Top countries
Countries with organic activities[1]	2021: 191 countries	
Organic agricultural land	2021: 76.4 million hectares (1999: 11 million hectares)	Australia (35.7 million hectares) Argentina (4.1 million hectares) France (2.8 million hectares)
Organic share of total agricultural land	2021: 1.6 %	Liechtenstein (40.2 %) Samoa (29.1 %) Austria (26.5 %)
Increase of organic agricultural land 2020/2021	1.3 million hectares (ha); +1.7 %	China: 319'000 ha (+13 %), France: 228'000 ha (+9 %) Spain: 198'000 ha (+8%)
Wild collection and further non-agricultural areas	2021: 29.7 million hectares (ha) (1999: 4.1 million hectares)	Finland (6.9 million ha) Zambia (2.5 million ha) Namibia (2.3 million ha)
Producers	2021: 3.7 million producers (1999: 200'000 producers)	India (1'599'010) Uganda (404'246) Ethiopia (218'175)
Organic market[2]	2021: 124.8 billion euros (2000: 15.1 billion euros)	US (48.6 billion euros) Germany (15.9 billion euros) France (12.7 billion euros)
Per capita consumption	2021: 15.7 euros	Switzerland (425 euros) Denmark (384 euros) Luxembourg (313 euros)
Number of countries/ territories with organic regulations	2022: 74 (fully implemented)	
Number of affiliates of IFOAM – Organics International	2022: 791 affiliates	Germany: 81 affiliates China: 54 affiliates India: 46 affiliates USA: 45 affiliates

Source: FiBL survey 2023, based on national data sources, data from certifiers and IFOAM – Organics International

[1] Where the designation "country" appears in this book, it covers countries and territories, see UNSTAT website https://unstats.un.org/unsd/methodology/m49/

[2] Please note that there are some differences in organic food sales figures from Ecovia Intelligence and those from FiBL due to different methodologies. According to Ecovia Intelligence, global retail sales reached 135.5 billion US dollars in 2021 (see article by Sahota in this volume). One euro corresponded to 1.1827 US dollars in 2021 according to the European Central Bank.

The World of Organic Agriculture 2023: Summary

Jan Trávníček[1], Bernhard Schlatter,[2] Lauren Dietemann[3] and Helga Willer[4]

The latest available data on organic agriculture worldwide show that 2021 was another good year for global organic agriculture. According to the latest FiBL survey on organic agriculture worldwide, organic farmland and organic retail sales continued to grow and reached another all-time high, as shown by the data from 191 countries (data as of the end of 2021).

Statistics on organic area

More than 76.4 million hectares of organic farmland

In 2021, over 76.4 million hectares of organic agricultural land, including in-conversion areas, were recorded. The regions with the largest organic agricultural land areas are Oceania (36.0 million hectares – almost half the world's organic agricultural land pr 47 percent) and Europe (17.8 million hectares, 23 percent). Latin America had 9.9 million hectares (13 percent), followed by Asia (6.5 million hectares, 8.5 percent), Northern America (3.5 million hectares, 4.6 percent) and Africa (2.7 million hectares, 3.5 percent).

Australia has the largest area

Countries with the most organic agricultural land were Australia (35.7 million hectares), Argentina (4.1 million hectares) and France (2.8 million hectares).

Globally, 1.6 percent of the farmland is organic

In 2021, 1.6 percent of the world's agricultural land was organic. The highest organic shares of the total agricultural land, by region, were in Oceania (9.7 percent) and in Europe (3.6 percent; European Union: 9.6 percent).

Liechtenstein had the highest organic share, with 40.2 percent

Some countries reach far higher shares than the global share: Liechtenstein (40.2 percent), Samoa (29.1 percent) and Austria (26.5 percent) had the highest organic shares. In 20 countries, 10 percent or more of the agricultural land was organic – a new record.

Growth in organic farmland – Increase of 1.3 million hectares

Organic farmland increased by 1.3 million hectares (1.7 percent) in 2021. Many countries reported a significant increase. In absolute terms, the biggest increases were

[1] Jan Trávníček, Czech Organics, Staré Město, Czech Republic, www.czechorganics.com
[2] Bernhard Schlatter, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[3] Lauren Dietemann, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[4] Dr. Helga Willer, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org

in China, France and Spain: in China, organic farmland increased by almost 320'000 hectares (+13.1 percent), in France by nearly 228'000 hectares (+8.9 percent) and in Spain by almost 198'000 hectares (+8.1 percent). However, some countries also reported decreases. The most notable decrease occurred in Argentina, which reported almost 0.38 million hectares less (mainly grazing areas).

Increase of organic farmland in Africa, Asia, Europe and Oceania

In 2021, organic agricultural land increased in Africa, Asia, Europe and Oceania (Table 5). The highest absolute growth was in Europe (+4.4 percent, +0.75 million hectares), followed by Africa (+17.3 percent, +0.39 million hectares) and Asia (+5.8 percent, +0.36 million hectares), while Latin America and North America reported a decrease of organic farmland.

Growth in most major crop groups

Land use and crop details were available for over 92 percent of the organic agricultural land. Some countries with very large organic areas, such as Brazil and India, had little or no information on their land use (see page 72).

Nearly two-thirds of the organic agricultural land was grassland/grazing areas (almost 50 million hectares), which decreased by 2.5 percent in 2021.

With almost 14.8 million hectares, **arable land constituted 19 percent of the organic** agricultural land. An increase of 11.4 percent since 2020 was reported. Most of this category of land was used for cereals, including rice, followed by green fodder from arable land, oilseeds, textile crops and dry pulses.

Permanent crops accounted for 8.1 percent of the organic agricultural land, amounting to over 6.2 million hectares. Compared to the previous survey, an increase of almost 829'000 hectares, or 15.4 percent, was reported. The most important crops were coffee, olives, nuts, grapes and cocoa (see page 70).

Further organic areas

Apart from land dedicated to organic agriculture, there are further areas of organic land dedicated to other activities. The largest parts of these are wild collection areas and beekeeping areas. Further non-agricultural areas include aquaculture, forests and grazing areas on non-agricultural land. These areas totalled 31.8 million hectares, and all the organic areas together summed up to 108.3 million hectares.

Organic cotton

Based on our estimates, the 2020/21 global harvest saw 342’265 tonnes of organic cotton fibre produced on 621’691 hectares of certified organic land and 180’726 tonnes of in-conversion cotton fibre produced on 293’204 hectares of land in-conversion to organic. Compared to 2019/20, this represents an estimated 37 percent growth in organic cotton fibre, meaning that 1.4 percent of all cotton grown is estimated to have been organic (See the article by the Textile Exchange on page 124).

Organic palm oil

Bernet and van den Berge (page 128) provide an analysis of the current market situation of organic palm oil, of which more than 20'000 metric tons were imported into the European Union in 2021. They expect the efforts to promote the production of sustainable palm oil to continue and that in countries where this debate is more advanced, consumers will be increasingly aware that private organic standards help ensure that palm oil is produced in contexts and ways that are favourable for having positive environmental and social impacts.

Organic operators

Organic producers on the rise – 3.7 million producers in 2021

There were at least 3.7 million organic producers in 2021.[1] Forty-nine percent of the world's organic producers are in Asia, followed by Africa (31 percent), Europe (12 percent) and Latin America (8 percent). The countries with the most producers are India (1'599'010), Uganda (404'246) and Ethiopia (218'175) (page 56). There has been an increase in the number of producers of more than 170'000, or 4.9 percent, compared to 2020. For more information, see page 54.

Global market and organic imports

Global market reached nearly 125 billion euros

Organic food and drink sales reached nearly 125 billion euros, according to FiBL (page 60)[2] [3] in 2021. In 2021, the countries with the largest organic markets were the United States (48.6 billion euros), Germany (15.9 billion euros) and France (12.7 billion euros). The largest single market was the United States (39 percent of the global market), followed by the European Union (46.7 billion euros, 37 percent) and China (11.3 billion euros, 9.1 percent). Switzerland had the highest per-capita consumption in 2021, with 425 euros. The highest organic market shares were reached in Denmark (13.0 percent), Austria (11.6 percent) and Luxembourg (11 percent).

Growth in the global market for organic food and drink slowed in 2021, writes Sahota (page 134). Geopolitical conflicts and rising food prices are having a negative impact on the global organic food market. After reporting record sales in 2020, market growth slowed to just five percent in 2021. Lower growth is projected for 2022 as consumer demand weakens; inflation, especially high food prices, and food security concerns are

[1] Please note that some countries report only the numbers of companies, projects, or grower groups, which may each comprise a number of individual producers. It may be assumed that the total number of organic producers is higher than that reported here.

[2] Please note that there are some differences in organic food sales figures from Ecovia Intelligence and those from FiBL due to different methodologies. According to Ecovia Intelligence, global retail sales reached over 135.5 billion U.S. dollars in 2021.

[3] In 2021, 1.1827 US dollars corresponded to 1 euro.

affecting demand for organic foods. The European market has been the most adversely affected.

EU organic imports

US and EU organic imports combined amounted to 4.7 million metric tons in 2021 (see chapter by Schlatter et al., page 32).

In 2021, 2.9 million metric tons of organic agri-food products were imported to the European Union, representing a 2.8 percent increase compared to the 2.8 million MT imported in 2020.[1] A detailed look at the product categories shows that while imports of organic tropical fruit have increased, imports of cereals, oilcake and sugar have declined. The main trading partners were Ecuador and the Dominican Republic, both principal exporters of organic bananas. The main importing EU Member States in 2021 were the Netherlands and Germany, which accounted for more than half of the EU organic imports. For more information, see the summary of the European Commission's market brief on organic imports into the European Union in 2021 (page 137).

Regulations and policies

Organic regulations

Regarding regulations, according to the latest data collected by IFOAM - Organics International, in 2022, 74 countries had fully implemented regulations on organic agriculture. Twenty-one countries had organic regulations that were not fully implemented, and 15 were drafting legislation. Regions with significant changes were the European Union, North America, and the Pacific Region. (See article by Hysa et al. on page 148).

Policies for organic farming

Many countries are setting up policies fostering agroecology and organic agriculture. In Hysa et al.'s article (page 148), examples from countries all over the world are shown, such as Argentina (creation of a national directorate of agroecology), Saudi Arabia (Organic Agriculture Policy Action Plan), Mexico (policy change to favour good security and food sovereignty), Ghana (support for organic farming in the framework of the Agriculture Sector Development Policy), Tanzania (National Strategy of Ecological Organic Agriculture) and India (support within the framework of the Indian Natural Development Programme).

Participatory Guarantee Systems in 2022

IFOAM - Organics International is the only organisation collecting data about Participatory Guarantee Systems (PGS) on a global level. In 2022, 323 PGS initiatives were active in 78 countries, with at least 1.4 million producers involved and more than 1.3 million producers certified. These producers were estimated to manage almost 0.9

[1] It should be noted that imports from the United Kingdom (amounting to 0.1 million metric tons) were included in the 2021 import volume, but not that for 2020. For details see chapter on EU organic imports.

million hectares of land. More information, including PGS developments in the regions, is available in the article from Anselmi and Moura e Castro (page 157).

Organic in the Continents

Africa

There were nearly 2.7 million hectares of certified organic agricultural land in Africa in 2021. Africa reported more than 390'000 hectares more than in 2020, a 17.3 percent increase, and over 1'123'000 producers. Uganda was the country with the largest organic area (over 505'000 hectares in 2021), and Uganda had the largest number of organic producers (more than 404'000). The country with the highest percentage of land devoted to organic farming in the region was the island state of São Tomé and Príncipe, with 21.1 percent of its agricultural area dedicated to organic crops. The majority of certified organic products in Africa are destined for export markets. Key crops are cocoa, olives, coffee, nuts, cotton and oilseeds (see page 187). Five countries in Africa have legislation on organic agriculture, and seven countries are drafting legislation. Six countries have a national standard but lack legislation on the definition of organic farming (East African Organic Product Standard) (See article by Hysa et al. on page 148).

Ecological Organic Agriculture in Africa continued to receive much attention from various actors, including farmers, practitioners, researchers, policymakers and other stakeholders post-COVID-19 pandemic. The Ecological Organic Agriculture Initiative (EOA-I) continued to reach out to smallholder farmers. The Knowledge Centre for Organic Agriculture in Africa (KCOA), with its regional Knowledge Hubs, provided support for organic agriculture in all parts of Africa through knowledge management, dissemination and capacity building and market systems development. AfrONet, the umbrella of African Organic Movements, is promoting the establishment of regional networks and national organic movements (NOAMS) where they do not exist yet. In collaboration with AfroNet, preparations for the 5th African Organic Conference started, and it is expected to be held in 2023. The Network for Organic Agriculture Researchers (NOARA) held the 1st Africa Research Conference in Nigeria from 6 to 8 December 2022 in Ibadan, Nigeria. For more updates about Africa, see the contribution by Amudavi et al. on page 166.

In their country report about Kenya, Ndungu and Njoroge (page 180) state that despite a sluggish economy, Kenya's organic sector has continued to thrive in recent years. Exports of organic products continue to dominate organic sector development, with Kenya being known for its production of a variety of organic fruits, nuts, essential oils, herbs, spices, coffee, tea, and flowers, which are all in high demand globally. The country's tropical climate, the location near Europe and the Middle East, and continuously improving infrastructure make it an ideal place for cultivating and exporting these relatively high-value products. Regarding the domestic market, established supermarkets and organic retail stores have further solidified their position and increased their organic supply, while farmers' markets selling organic products have expanded beyond the capital city of Nairobi.

Asia

The total area dedicated to organic agriculture in Asia was more than 6.5 million hectares in 2021. There were nearly 1.8 million producers, most of whom were in India. The leading countries by area were China (2.75 million hectares) and India (over 2.66 million hectares). Timor-Leste had the highest proportion of organic agricultural land (8.5 percent). (For detailed statistics, see page 212). Twenty-one countries in the region have legislation on organic agriculture, and seven countries are drafting legislation (See article by Hysa et al. on page 148).

The year 2022 continued the positive developments in the organic sector throughout the Asian region. It was evident that organic activities are resuming after a few years of the COVID-19 pandemic.

In China, the Ministry of Agriculture and Rural Affairs issued the Implementation Plan of the "14th Five-Year Plan for National Economic and Social Development of the People's Republic of China and the Outline of Long-term Goals". The recognition of Participatory Guarantee Systems continued in India, Indonesia, Kyrgyzstan, the Philippines and Vietnam, addressing the need of the domestic markets. Japan saw the launch of the "Organic Village" project by the Ministry of Agriculture, Forestry and Fisheries (MAFF) to stimulate the growth of the organic share to 25 percent by 2050. IFOAM Organics Asia implemented the co-organised the 2022 IFOAM-Goesan International Organic Expo, the event's highlight being the 50th IFOAM Anniversary Commemorative Conference (more information is available in the chapter of IFOAM Organic Asia on page 200).

Europe

As of the end of 2021, 17.8 million hectares of agricultural land in Europe (European Union: 15.6 million hectares) were managed organically by more than 440'000 producers (European Union: almost 380'000). In Europe, 3.6 percent of the agricultural area was organic (European Union: 9.6 percent). Organic farmland has increased by nearly 0.75 million hectares compared to 2020. The countries with the largest organic agricultural areas were France (2.8 million hectares), Spain (2.6 million hectares) and Italy (2.2 million hectares). In 15 countries, at least 10 percent of the farmland was organic: Liechtenstein had the lead (40.2 percent), followed by Austria (26.5 percent) and Estonia (23 percent). Retail sales of organic products totalled 54.5 billion euros in 2021 (European Union: 46.7 billion euros), an increase of 4 percent since 2020. The largest market for organic products in 2020 was Germany, with retail sales of 15.9 billion euros, followed by France (12.7 billion euros) and Italy (3.9 billion euros) (See the article by Willer et al., page 235). In Europe, 43 countries have legislation on organic agriculture. (See article by Hysa et al. on page 148).

The consolidated data for 2021 show continued retail sales growth in most countries; however, other than in 2020, it was single-digit while organic farmland grew faster than organic retail sales. For EU organic agriculture to reach the 25 percent goal by 2030, as set out by the European Commission, stronger annual growth will be needed than in 2021.

In June 2018, the new EU regulation 2018/848[1] on the production and labelling of organic products was published but, due to the COVID-19 pandemic, postponed by one year to 1 January 2022[2]. The development of secondary legislation started in June 2018 and is ongoing. The new regulations on the European Union's Common Agricultural Policy (CAP) were adopted in November 2021. A detailed analysis of the CAP Strategic Plans 2023–2027 and how Member States support organic agriculture will be published in spring 2023 as part of the project OrganicTargets4EU "Transformation scenarios for boosting organic farming and organic aquaculture towards the Farm-to-Fork targets". As to research, since the mid-1990s, an increasing number of organic research projects focussing on organic food and farming have been funded by the EU Research & Innovation Framework Programmes. Starting with the work programme 2023–2024, the European Union's research programme Horizon Europe, which includes seven organic-specific calls, foresees an allocation of at least 30 percent of the budget for research and innovation actions in the fields of agriculture, forestry and rural areas to topics specific to or relevant for the organic sector. (See the contribution by Busacca et al. on page 225).

The report about organic agriculture in Ukraine provided by Vysotskyi et al. (page 265) shows that 422'299 hectares (1 percent of total farmland) were under organic management. Of these, 370'110 hectares were fully converted. Organic export has a major share in the Ukrainian organic market. Despite the war, in 2022, Ukraine exported 225'814 metric tonnes of organic products to the EU and Switzerland, a 13 percent increase compared to 2021 (200'239 metric tons). The most significant negative impacts of the war on the production processes include the overall safety situation, access to financial resources, destroyed infrastructure and lack of fuel and lubricants. Many organic operators have experienced direct losses because of occupation and direct hits, seaports blockade, destruction of infrastructure facilities and supply chains, and a significant increase in prices of inputs, fuel and logistics. The main problems of the domestic organic market are the disrupted supply chains, migration of many organic consumers to other regions and abroad, decreased purchasing power and, therefore, reduced demand for organic.

Latin America and the Caribbean

In Latin America, **over 227'000 producers managed nearly 9.9 million hectares of agricultural land organically in 2021**. This constituted 12.9 percent of the world's organic land and 1.4 percent of the region's agricultural land. The leading countries were Argentina (4.1 million hectares), Uruguay (2.7 million hectares) and Brazil

[1] Regulation (EU) 2018/848 of the European Parliament and of the Council of 30 May 2018 on organic production and labelling of organic products and repealing Council Regulation (EC) No 834/2007; http://data.europa.eu/eli/reg/2018/848/oj

[2] Regulation (EU) 2020/1693 of the European Parliament and of the Council of 11 November 2020 amending Regulation (EU) 2018/848 on organic production and labelling of organic products as regards its date of application and certain other dates referred to in that Regulation (Text with EEA relevance); http://data.europa.eu/eli/reg/2020/1693/oj

(1.5 million hectares). The highest organic shares of total agricultural land were in Uruguay (19.6 percent), French Guiana (11.9 percent) and the Dominican Republic (11.6 percent). Many Latin American countries remain important exporters of organic products such as coffee, cocoa and bananas. Nineteen countries in the region have legislation on organic agriculture, and two countries are drafting such legislation. (See article by Hysa et al. on page 148). Brazil has the largest market for organic products in Latin America.

Organic production in Latin America grew slowly despite the challenges faced in 2022, recovering from the economic downturn caused by the coronavirus pandemic, food inflation and getting back on track with economic growth and poverty reduction. Local markets for certified organic products are still very small, despite the steady increase in the urban population; poverty, however, increased during the pandemic. Several Latin American countries have national logos to identify organic products in their national marketplaces, but very often, operators just use the EU or US logos; Brazil and Mexico are the countries where it is easier to find the national logo in the retail sector. While Argentina approved the Organic Argentina 2030 Strategic Plan, in Colombia, a study on the impacts of organic regulations was commissioned; this study is connected to their 2030 Agroecology Plan. Peru approved its 2030 Plan for the Promotion of Organic or Ecological Production. The interest in agroecology continues to grow in the region. The 9th Latin American Congress in Agroecology, organised by the Latin American Scientific Society of Agroecology (SOCLA in Spanish), was celebrated in Costa Rica in 2022 with over 500 participants from Latin America and Spain (page 278).

North America

In North America, over 3.5 million hectares of farmland were managed organically in 2021. Of these, 2.3 million were in the United States, and 1.2 million were in Canada, representing 0.8 percent of the total agricultural area in the region (see page 302).

United States

In 2021, U.S. shoppers returned to more stable shopping patterns. Food sales, which comprise over 90 percent of U.S. organic sales, rose to 57.5 billion US dollars (roughly 2 percent growth). The United States Department of Agriculture (USDA) in June 2022 took steps to build the next generation of American organic producers and strengthen organic supply chains with its announcement that it would invest 300 million US dollars[1] over five years to support farm operations during the transition to organic in its new Organic Transition Initiative. The announcement represents the USDA's largest single investment in organic products. Consumer demand for organic products remained strong, and growth continued, but it was constrained primarily due to supply challenges (seed and raw material shortages, packaging material issues, or high costs in feed, inputs, shipping, and transportation). Global demand for American-produced organic products has never been greater: The Department of Agriculture's statistics

[1] 1.1827 US dollars corresponded to 1 euro in 2021, according to the Central European Bank.

show that the value of U.S. organic exports nearly doubled between 2011 and 2021 – increasing from around 400 million US dollars to just over 700 million US dollars. (See the contribution by Jagiello on page 292).

Canada

The organic marketplace in Canada continues to expand. Canada is the fifth-largest organic market in the world. While in the past, production numbers did not keep up with the demand in Canada, 2021 did experience less growth in producers and acreage than in prior years. Although there was a decrease in acreage in Canada between 2020 and 2021 due to climatic conditions, decertifications and supply chain challenges due to COVID-19, there are more producers that will be entering the system in two to three years. Canada is currently home to more than 1.2 million hectares of organic farmland (See the contribution by Loftsgard on page 299).

Oceania

This region includes Australia, New Zealand and the Pacific Islands states. Altogether, there were over 18'000 producers on 36 million hectares, constituting 9.7 percent of the region's agricultural land and nearly half the world's organic land. More than 99 percent of the organic land in the region is in Australia (35.7 million hectares, mostly extensive grazing land), followed by Papua New Guinea (over 88'000 hectares) and Samoa over 82'000 hectares). The highest organic shares of all national agricultural land were in Samoa (29.1 percent), followed by Australia (9.9 percent), Papua New Guinea (7.4 percent), Fiji (7.1 percent), French Solomon Islands (7 percent) and French Polynesia (3.5 percent). Four countries in Oceania have legislation on organic agriculture, while thirteen countries have a national standard but no organic legislation (See article by Hysa et al. on page 148). For statistics about organic agriculture in Oceania, see page 326.

Australia

Australia's organic industry has been challenged by manifold factors in recent years, including disruptions caused by the global pandemic, natural disasters (bushfires in 2020, floods in 2022), as well as global inflation and its flow-on effects. Despite this, the industry remains robust, with new certified operators regularly entering the market and positive consumer sentiment noted, reports Frampton on page 312. Australia is one of the few developed nations in the world not to have implemented a domestic regulatory standard for the production and sale of organic products. However, the introduction of domestic regulation appears to be moving closer. (See article by Frampton on page 312).

New Zealand

Organic agriculture is a fast-growing sector in Aotearoa, New Zealand. It is well placed to continue leveraging the country's clean, green reputation, and it is an increasingly important pillar in telling Aotearoa's story to international consumers. Through the COVID pandemic, New Zealand's food and beverage image has provided a global opportunity for the country as COVID has shifted consumer behaviour and perceptions

in New Zealand's major markets, amplifying consumer interest in food safety and quality. Another notable development is that the National Māori Organics Authority of Aotearoa makes a strong contribution to Māori organics through its presence and through continuing support for Māori organic growers. (See article by Tompkins on page 316).

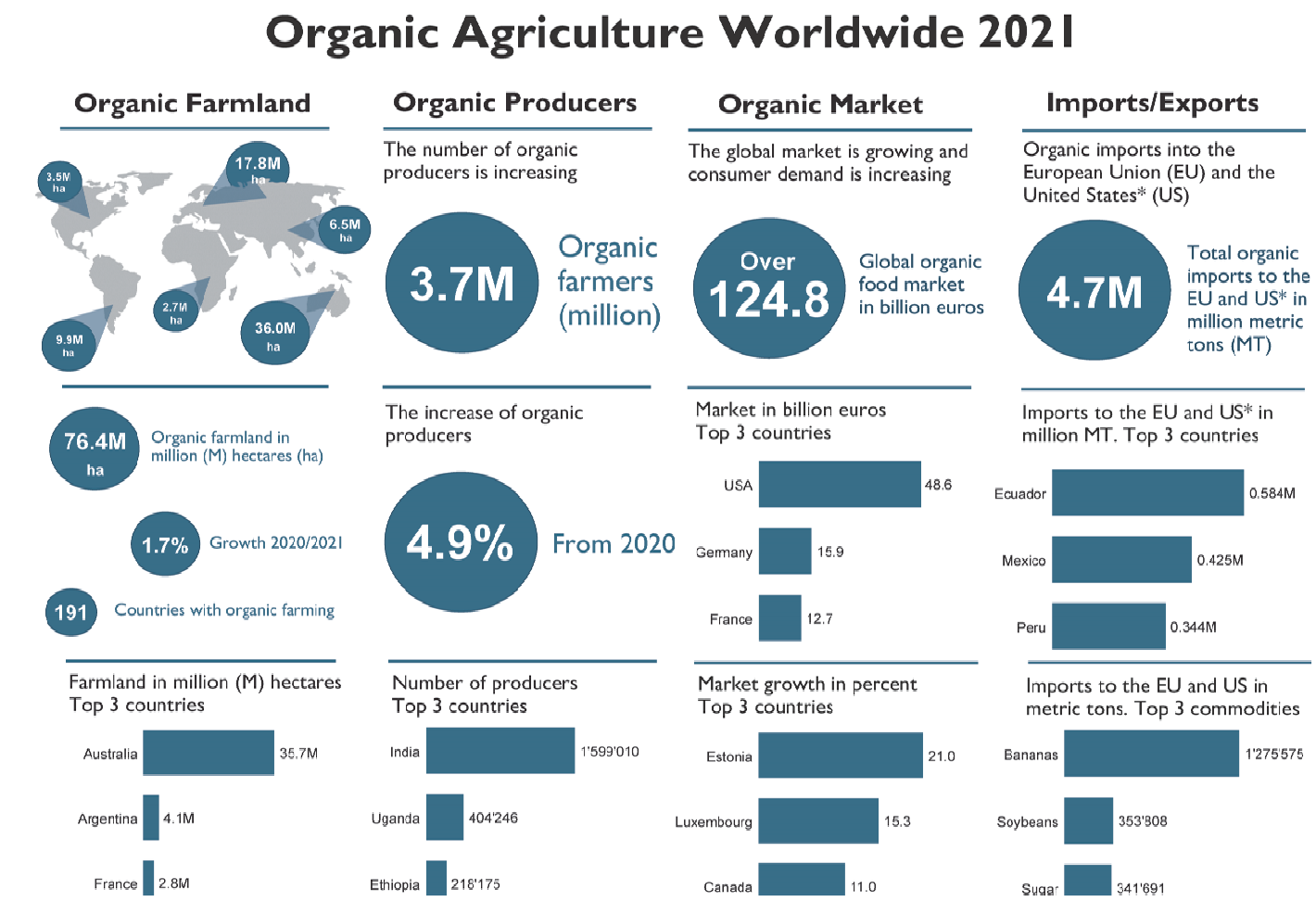
Pacific Islands

COVID-19, including supply chain disruptions, restrictions on mobility, and border closures, continued to substantially impact organic farmers, supply chains, and certification across the Pacific Islands. Audit and inspections have been severely impacted as few countries have nationally based inspectors; they fly in from neighbouring regions of Australia, New Zealand or South East Asia, and even the United States. Some licensees have been able to undertake virtual audits, which has meant that no new farms or licensees have been able to take up certification. However, governments continue to take action to create a supportive policy environment, the demand for certification continues, and regional and national agencies and development partners are increasingly recognising the value of organic agriculture as a development tool for the Pacific Islands context. A survey to assess the impact of COVID-19 on production and livelihoods found that farmers had difficulty accessing markets. Village-level income sources were lost due to increasing unemployment among community members, especially in Fiji. Inter-island supply chain logistics have been significantly affected during lockdown periods, and some farmers were unable to access inputs. Domestic sales dropped dramatically due to the lack of tourists, while regional and international sales have diminished due to border closures. As most of the organically certified products from the Pacific are for export, the pandemic has forced producers to seek to expand local market opportunities, giving impetus to the trend of previous years of growing local markets through basket (box) schemes, unverified organic claims on labels, PGS development, organic stalls at farmers markets and increased awareness. (See article by Mapusa on page 322148).

Next FiBL Survey on Organic Agriculture Worldwide

The next global organic survey will start in mid-2023; data will be published in February 2024 and presented at the 2024 edition of the Biofach Organic Trade Fair in Nuremberg, Germany. We will contact all relevant experts and would be very grateful if data could be sent to us. Should you notice any errors regarding the statistical data in this volume, please let us know; we will then correct the information in our database and provide the corrected data in the 2024 edition of "The World of Organic Agriculture". Corrections will also be posted on www.organic-world.net.

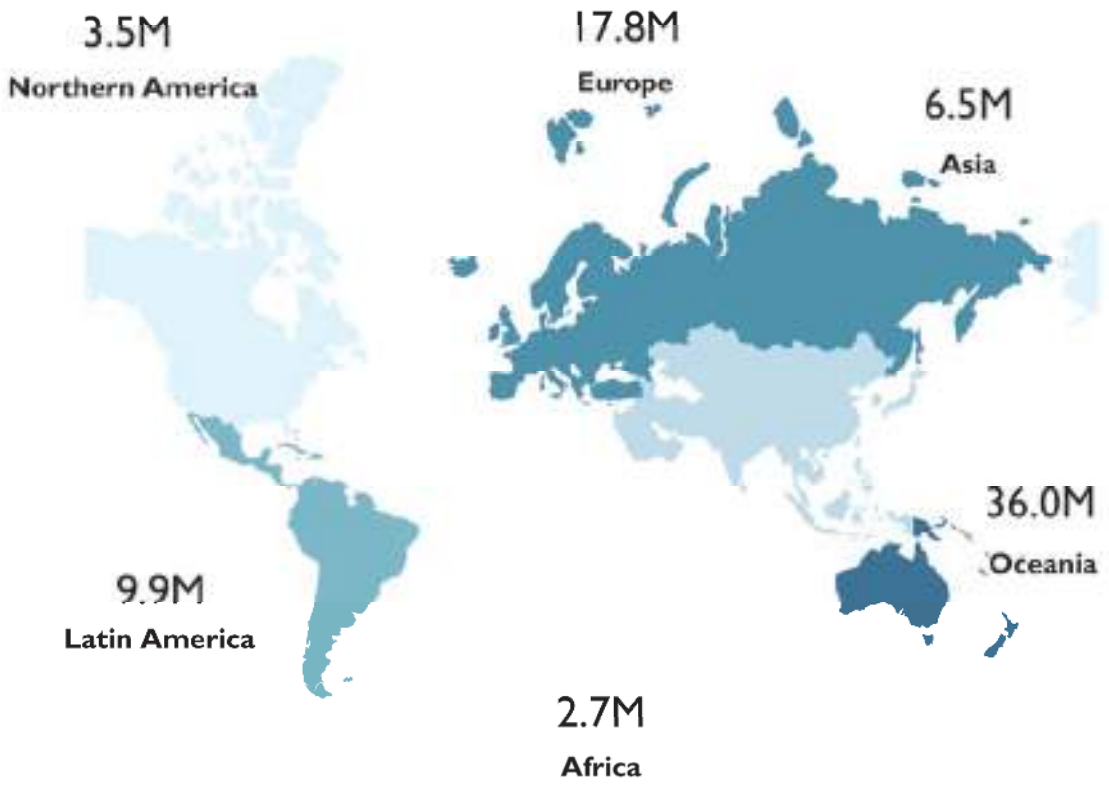
Contact: helga.willer@fibl.org



Infographic 1: Organic agriculture worldwide - key indicators 2021

Source: FiBL survey 2023

Organic Agriculture Worldwide: Current Statistics



Organic agricultural land in hectares (M=millions)

Map 1: Organic agricultural land in 2021

Source: FiBL survey 2023

Current Statistics on Organic Agriculture Worldwide: Area, Operators, Retail Sales and International Trade

BERNHARD SCHLATTER[1], JAN TRÁVNÍČEK[2] AND HELGA WILLER[3]

Introduction

The 24th survey of certified organic agriculture worldwide was carried out by the Research Institute of Organic Agriculture FiBL in collaboration with many partners from around the world. The results are published jointly with IFOAM – Organics International. The survey was supported by the Swiss State Secretariat for Economic Affairs (SECO), the Sustainability Fund of Coop Switzerland, and NürnbergMesse.[4]

For this survey, 191 countries were covered using the following indicators: Area, producers and other operator types, retail sales and exports and imports.

In total, data were provided by more than 200 experts. Governments, private sector organizations, certifiers and market research companies have contributed to the data collection effort. Several international certifiers deserve special mention as they provided data on several countries: ACO Certification, Bioinspecta, CCPB, CERES, Certisys, Control Union, Ecocert, Mayacert, Ecoglobe, Ekoagros, ICEA, Imocert, Kiwa BCS Oko-Garantie GmbH, LACON, LETIS, NASAA Certified Organic (NCO), Organic Agriculture Certification Thailand (ACT), Organización Internacional Agropecuaria (OIA), OneCert and Quality Certification Services (QCS).

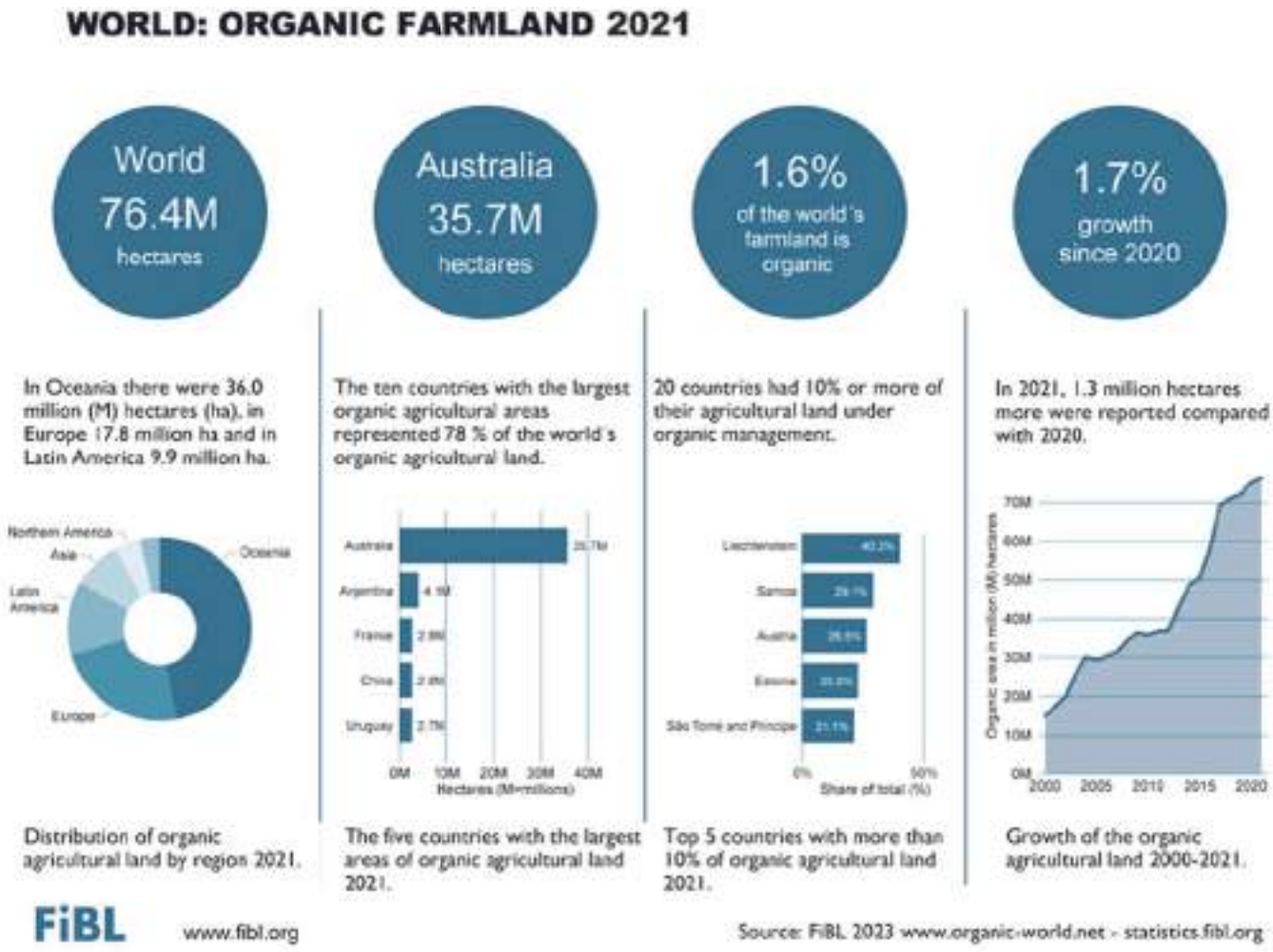
Our collaboration with the Inter-American Commission for Organic Agriculture (CIAO) eases data collection in Latin America and the Caribbean substantially. Data from the Mediterranean countries were supplied by the Mediterranean Organic Agriculture Network (MOAN, c/o Mediterranean Agronomic Institute of Bari). Data from the Pacific Islands were provided by the Pacific Organic and Ethical Trade Community (POET.com). Another important source covering many countries is Eurostat, the statistical office of the European Union. A list of all data sources and contacts is provided in the annex. For more details about the data providers, the countries and indicators covered as well as general notes on the data, see page 357.

More information on statistics.fibl.org

Interactive tables and graphs with more details on crops, markets, and international trade, as well as explanations for data, can be found on FiBL's statistics website statistics.fibl.org.

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[1] Bernhard Schlatter, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[2] Jan Trávníček, Czech Organics, Staré Město, Czech Republic, www.czechorganics.com
[3] Dr. Helga Willer, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[4] The organisers of BIOFACH, the World Organic Trade Fair in Nuremberg, Germany (today: NürnbergMesse), have supported data collection on organic agriculture worldwide and the production of the yearbook "The World of Organic Agriculture" since 2000.



Infographic 2: Organic farmland 2021

Source: FiBL survey 2023

Organic land

Organic agricultural land

In 2021, 76.4 million hectares were under organic agricultural management worldwide.[1] This constituted 1.6 percent of the total farmland. Organic farmland increased by 1.7 percent in 2021.

- The region with the most organic agricultural land was Oceania, with 36.0 million hectares, followed by Europe with 17.8 million hectares, Latin America (9.9 million hectares), Asia (6.5 million hectares), Northern America (3.5 million hectares) and Africa (2.7 million hectares).
- Oceania has almost half (47 percent) of the global organic agricultural land. Europe, a region that has had a very constant growth of organic land over the years, had over 23 percent of the world's organic agricultural land, followed by Latin America with almost 13 percent (Figure 1, page 35).
- Australia is the country with the most organic agricultural land; it is estimated that 97 percent of the farmland is extensive grazing areas. Argentina is second, followed by France in third place, the first time a European country holds this position (Figure 2, page 35). The ten countries with the largest organic agricultural areas have a combined total of 59.6 million hectares and constitute almost 80 percent of the world's organic agricultural land.
- Apart from the organic agricultural land, there are further organic areas such as wild collection areas. These areas constituted approximately 30 million hectares.

Table 1: World: Organic agricultural land (including in-conversion areas) and regions' shares of the global organic agricultural land 2021

Region	Organic agricultural land [hectares]	Regions' shares of the global organic agricultural land [%]
Africa	2'663'983	3.5%
Asia	6'504'211	8.5%
Europe	17'844'853	23.4%
Latin America	9'870'887	12.9%
Northern America	3'542'140	4.6%
Oceania	35'985'809	47.1%
World*	**76'403'777**	**100%**

Source: FiBL survey 2023. Note: Agricultural land includes in-conversion areas and excludes wild collection, aquaculture, forest, and non-agricultural grazing areas.
**Total includes correction value for French overseas departments.*

[1] Data provided both for the fully converted and in conversion area are included in this work. However, some countries provided only data on the fully converted area, others only on the total organic agricultural land, and thus the conversion area is not known for many countries.

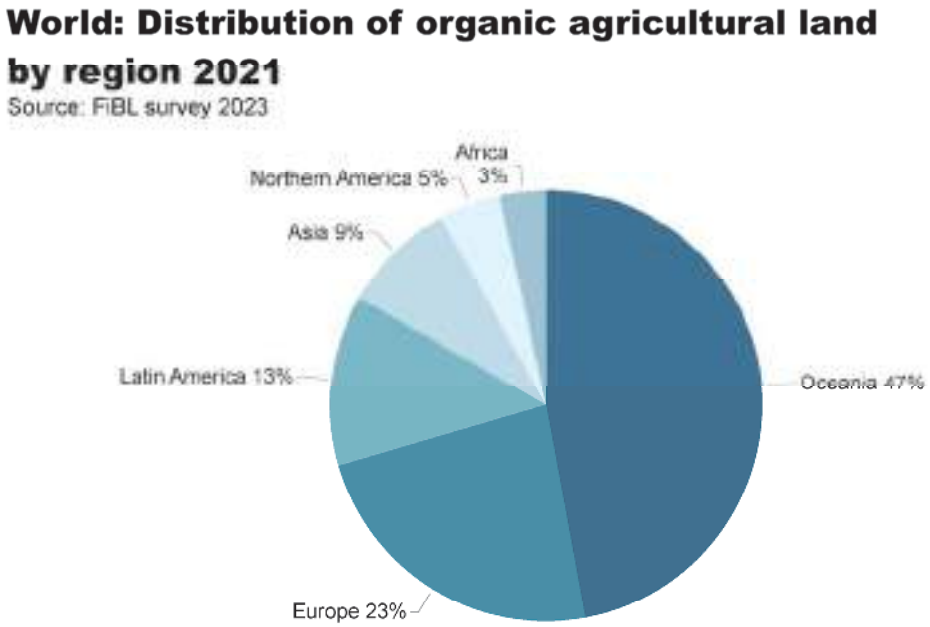


Figure 1: World: Distribution of organic agricultural land by region 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

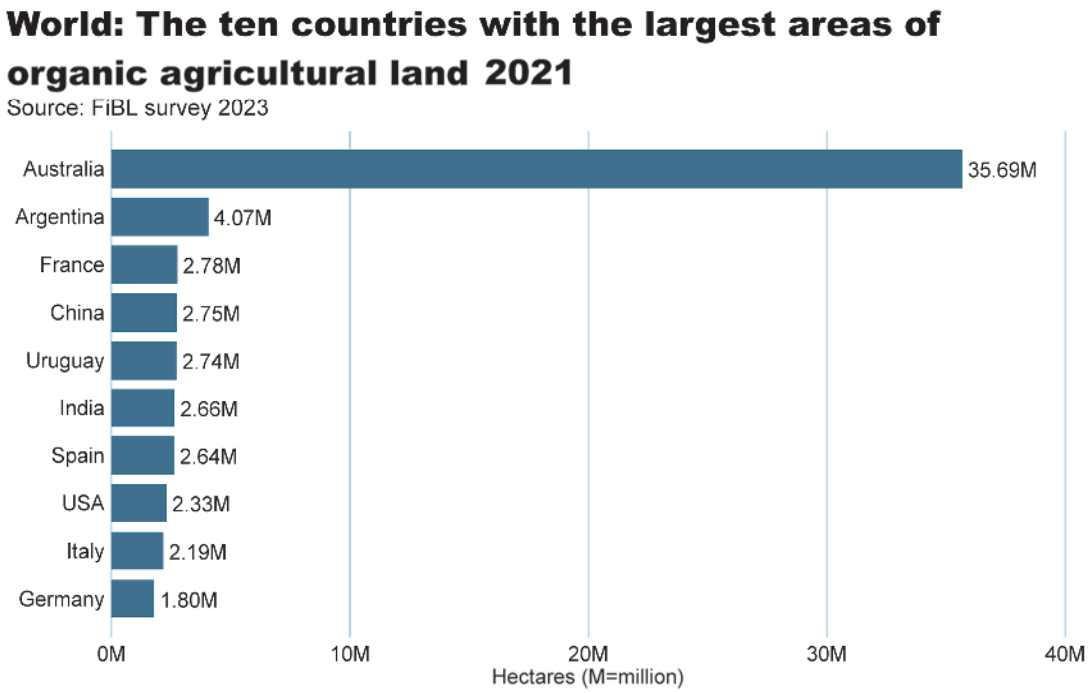


Figure 2: World: The ten countries with the largest areas of organic agricultural land 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Table 2: World: Organic agricultural land (including in-conversion areas) by country/territory 2021 (sorted)

For an alphabetical country list, see page Table 6.

Country/Territory	Hectares
Australia	35'687'799
Argentina	4'074'804
France	2'776'554
China	2'753'700
Uruguay	2'741'845
India	2'657'889
Spain	2'635'442
United States of America	2'326'551
Italy	2'186'159
Germany	1'802'231
Brazil	1'482'406
Canada	1'215'589
Austria	679'119
Russian Federation	655'457
Sweden	606'669
Romania	578'718
Czech Republic	558'124
Greece	534'629
Poland	509'286
Uganda	505'308
United Kingdom	489'200
Ukraine	422'299
Peru	374'926
Ethiopia	332'519
Finland	327'736
Türkiye	327'583
Portugal	308'289
Denmark	299'998
Hungary	293'597
Latvia	291'150
Tanzania	286'627
Tunisia	279'389
Lithuania	261'782
Mexico	238'075
Estonia	226'605
Slovakia	222'896
Philippines	216'334
Sierra Leone	193'954
Switzerland	181'444
Bolivia (Plurinational State of)	179'425
Thailand	167'985
Chile	152'773
Togo	130'858
Kenya	128'018
Croatia	121'924
Dominican Republic	117'312
Egypt	116'000
Kazakhstan	113'247
Paraguay	113'147
Belgium	101'828
Colombia	100'874
South Africa	97'359
Madagascar	95'083
Democratic Republic of the Congo	89'486
Papua New Guinea	88'014
Ireland	86'868
Bulgaria	86'310
Indonesia	83'362
Samoa	82'299
New Zealand	79'347
Burkina Faso	79'285
Côte d'Ivoire	78'783
Netherlands	76'375
Viet Nam	74'540
Guatemala	71'654
Pakistan	69'850
Sri Lanka	66'623
Honduras	66'179
Nigeria	58'028
Ecuador	52'185
Slovenia	52'078
Benin	48'898
Norway	45'112
Mozambique	41'048
Republic of Korea	40'663
Ghana	38'260
Azerbaijan	38'080
Nicaragua	37'357
Timor-Leste	32'311
Falkland Islands (Malvinas)	31'937
Kyrgyzstan	30'259
Fiji	30'194
Moldova	28'368
Saudi Arabia	27'110
Serbia	23'527
Tajikistan	22'292
Cambodia	21'112
Mali	17'840
Japan	11'992
Taiwan	11'765
Morocco	11'452
Costa Rica	10'300
Myanmar	10'143
Sao Tome and Principe	9'291
Solomon Islands	8'231
Lao People's Democratic Republic	7'993
North Macedonia	7'794
Cyprus	7'738
Iran	7'053
Luxembourg	6'893
Belarus	6'725
Iceland	6'440
Vanuatu	6'281
Panama	5'929
Israel	5'778
Bhutan	5'608
Palestine	5'517
United Arab Emirates	5'419

Country/Territory	Hectares
Uzbekistan	4'925
Rwanda	4'696
Montenegro	4'404
Georgia	4'278
French Guiana (France)	3'886
Eswatini	3'539
Zambia	3'376
Senegal	3'262
Dominica	2'907
Liberia	2'791
Haiti	2'739
El Salvador	2'565
Venezuela	2'496
Bosnia and Herzegovina	2'495
Nepal	2'448
Cuba	2'129
Réunion (France)	2'100
Kosovo	1'990
Lebanon	1'671
Cameroon	1'594
French Polynesia	1'592
Jordan	1'446
Liechtenstein	1'423
Guadeloupe (France)	1'300
Malaysia	1'276
Tonga	1'119
Albania	1'094
Zimbabwe	1'085
Sudan	960
Comoros	937
New Caledonia	800
Algeria	772
Martinique (France)	706
Belize	676
Armenia	583
Burundi	549
Bangladesh	504
Namibia	384
Malawi	324
Faroe Islands	251
Mongolia	241
Grenada	195
Channel Islands	180
Niue	117
Mayotte	114
Afghanistan	98
Malta	66
Iraq	63
Suriname	52
Bahamas	49
Kuwait	32
British Virgin Islands	26
Saint Lucia	25
Cook Islands	15
Singapore	15
Mauritius	13
Jamaica	11
Oman	7
Andorra	2
World*	**76'403'777**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources see annex, page 338
**Total includes correction value for French overseas departments*

Organic share of total agricultural land

The share of the world's agricultural land that is organic was 1.6 percent in 2021.

- The highest organic share of total agricultural land, by region, was in Oceania (9.7 percent), followed by Europe with 3.6 percent and Latin America with 1.4 percent. In the European Union, the organic share of the total agricultural land was 9.6 percent. In the other regions, the share is less than one percent (Table 3).
- Many individual countries, however, have a much higher organic share (Table 4, page 39), and in 20 countries, 10 percent or more of the agricultural land is used for organic production. Most of these countries are in Europe. The country with the highest organic share was Liechtenstein, with 40.2 percent of its agricultural land under organic management. It is interesting to note that many island states have high shares of agricultural land under organic management, such as Samoa and São Tomé and Príncipe.
- However, 47 percent of the countries for which data is available had less than one percent of their agricultural land under organic management.

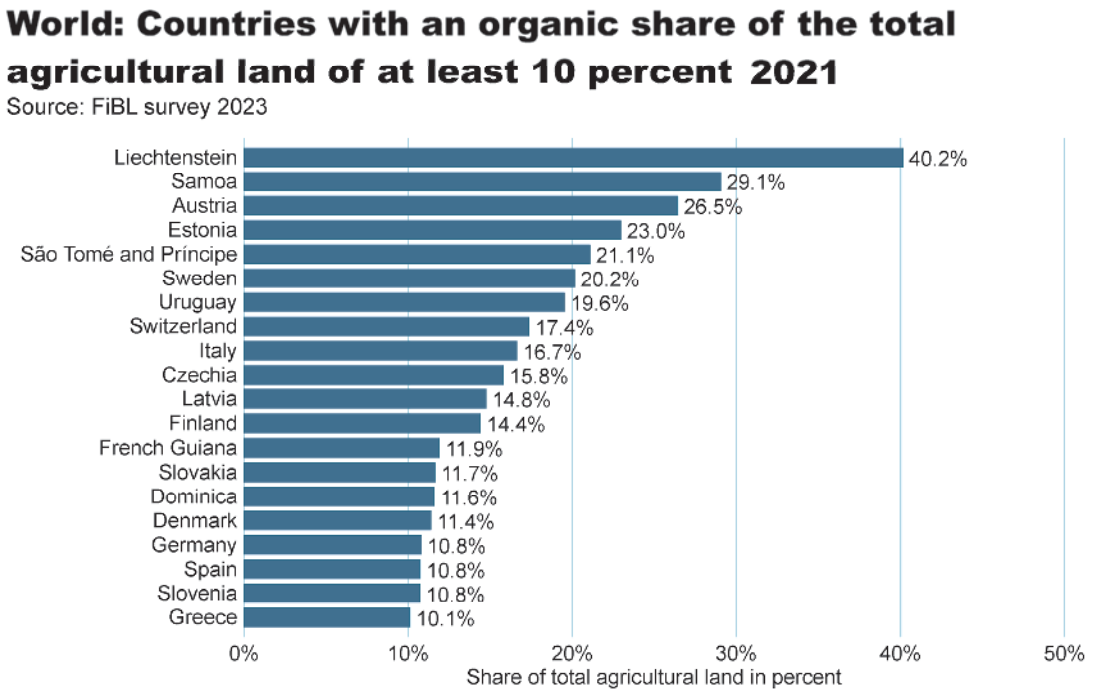


Figure 3: World: Countries with an organic share of the total agricultural land of at least 10 percent 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. Calculation of organic shares based on FAOSTAT, Eurostat, and national sources. For detailed data sources, see annex, page 338.

To calculate the percentages, the data on the total agricultural land for most countries was taken from FAO's Statistical database on the FAOSTAT website. For the European Union, most data were obtained from Eurostat. Where available, data from national sources were used for the total agricultural land (for instance, Austria, Switzerland, and the United States), which sometimes differs from that published by Eurostat or FAOSTAT. Please note that the calculation of the organic shares based on Eurostat and FAOSTAT data may differ in some cases from the data published by ministries and experts. FAOSTAT, the FAO Homepage, FAO, Rome at faostat3.fao.org > Agri-Environmental Indicators > Download http://www.fao.org/faostat/en/#data/RL

Table 3: World: Organic agricultural land (including in-conversion areas) and organic share of total agricultural land by region 2021

Region	Organic agricultural land [ha]	Share of total agricultural land [%]
Africa	2'663'983	0.2%
Asia	6'504'211	0.4%
Europe	17'844'853	3.6%
Latin America	9'870'887	1.4%
Northern America	3'542'140	0.8%
Oceania	35'985'809	9.7%
World*	**76'403'777**	**1.6%**

Source: FiBL survey 2023.
** Total includes correction value for French overseas departments.*

Table 4: World: Organic shares of total agricultural land by country 2021 (sorted)

For an alphabetical country list, see page Table 6.

Country/Territory	Organic share [%]
Liechtenstein	40.2%
Samoa	29.1%
Austria	26.5%
Estonia	23.0%
Sao Tome and Principe	21.1%
Sweden	20.2%
Uruguay	19.6%
Switzerland	17.4%
Italy	16.7%
Czech Republic	15.8%
Latvia	14.8%
Finland	14.4%
French Guiana (France)	11.9%
Slovakia	11.7%
Dominica	11.6%
Denmark	11.4%
Germany	10.8%
Spain	10.8%
Slovenia	10.8%
Greece	10.1%
Australia	9.9%
France	9.6%
Lithuania	8.9%
Timor-Leste	8.5%
Faroe Islands	8.4%
Croatia	8.1%
Portugal	7.8%
Belgium	7.4%
Papua New Guinea	7.4%
Fiji	7.1%

Country/Territory	Organic share [%]
Solomon Islands	7.0%
Hungary	5.9%
Cyprus	5.7%
Luxembourg	5.2%
Sierra Leone	4.9%
Dominican Republic	4.8%
Norway	4.6%
Réunion (France)	4.4%
Romania	4.3%
Netherlands	4.2%
Uganda	3.5%
Poland	3.5%
French Polynesia	3.5%
Togo	3.4%
Vanuatu	3.4%
Tonga	3.2%
Egypt	3.0%
Tunisia	2.9%
Falkland Islands (Malvinas)	2.8%
United Kingdom	2.8%
Argentina	2.7%
Guadeloupe (France)	2.5%
Republic of Korea	2.5%
Grenada	2.4%
Sri Lanka	2.4%
Niue	2.3%
Martinique (France)	2.3%
Singapore	2.2%
Canada	2.1%
Honduras	2.0%
Channel Islands	2.0%
Ireland	1.9%
Guatemala	1.9%
Philippines	1.7%
Montenegro	1.7%
Bulgaria	1.7%
Peru	1.6%
Taiwan	1.5%

Country/Territory	Organic share [%]
India	1.5%
United Arab Emirates	1.4%
Moldova	1.3%
Benin	1.2%
Palestine	1.2%
Bhutan	1.1%
Cook Islands	1.0%
Ukraine	1.0%
Chile	1.0%
Ecuador	1.0%
Israel	0.9%
Ethiopia	0.9%
Türkiye	0.9%
Azerbaijan	0.8%
Thailand	0.8%
New Zealand	0.8%
Nicaragua	0.7%
Tanzania	0.7%
Comoros	0.7%
Serbia	0.7%
Burkina Faso	0.7%
Brazil	0.6%
North Macedonia	0.6%
Malta	0.6%
Viet Nam	0.6%
Costa Rica	0.6%
United States of America	0.6%
Mayotte	0.6%
China	0.5%
Paraguay	0.5%
Bolivia (Plurinational State of)	0.5%
Kosovo	0.5%
Tajikistan	0.5%
Kenya	0.5%
New Caledonia	0.4%
Iceland	0.4%
Belize	0.4%
Cambodia	0.4%
British Virgin Islands	0.4%
Côte d'Ivoire	0.4%
Bahamas	0.3%
Lao People's Democratic Republic	0.3%
Russian Federation	0.3%
Eswatini	0.3%
Kyrgyzstan	0.3%
Democratic Republic of the Congo	0.3%
Japan	0.3%
Panama	0.3%
Rwanda	0.3%
Ghana	0.3%
Lebanon	0.3%
Saint Lucia	0.2%
Madagascar	0.2%
Mexico	0.2%
Colombia	0.2%
Pakistan	0.19%

Country/Territory	Organic share [%]
Georgia	0.18%
El Salvador	0.17%
Haiti	0.15%
Liberia	0.14%
Jordan	0.14%
Bosnia and Herzegovina	0.14%
Indonesia	0.13%
South Africa	0.10%
Mozambique	0.10%
Albania	0.09%
Nigeria	0.08%
Belarus	0.08%
Myanmar	0.08%
Suriname	0.06%
Nepal	0.06%
Kazakhstan	0.05%
Mali	0.043%
Morocco	0.038%
Senegal	0.037%
Armenia	0.035%
Cuba	0.034%
Burundi	0.027%
Kuwait	0.021%
Uzbekistan	0.019%
Cameroon	0.016%
Saudi Arabia	0.016%
Iran	0.015%
Malaysia	0.015%
Mauritius	0.015%
Zambia	0.014%
Venezuela	0.012%
Andorra	0.011%
Zimbabwe	0.007%
Malawi	0.006%
Bangladesh	0.005%
Jamaica	0.002%
Algeria	0.002%
Sudan	0.001%
Namibia	0.001%
Iraq	0.001%
Oman	0.0005%
Afghanistan	0.0003%
Mongolia	0.0002%
World	**1.6%**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. Calculation of organic shares based on FAOSTAT, Eurostat, and national sources. For detailed data sources, see annex, page 338

Growth of the organic agricultural land

Compared with 2001, when 15 million hectares were organic, organic agricultural land has increased five-fold (2021).

- In 2021, 1.3 million hectares, or 1.7 percent, more were reported compared with 2020.
- In 2021, the organic agricultural land increased in four continents (Table 5). The highest absolute growth was in Europe (+0.75 million hectares, +4.4 percent), followed by Africa, which showed the strongest relative growth (+17.3 percent, +0.39 million hectares) and Asia (+5.8 percent, +0.36 million hectares). The organic farmland decreased in Latin and North America.
- Some countries reported a significant increase, for instance, China (13.1 percent increase; almost 0.32 million hectares more), France (8.9 percent increase; almost 0.23 million hectares more), and Spain (8.1 percent increase; almost 0.2 million hectares more) (Figure 6).
- Eighty-six countries experienced an increase in the area of their organic agricultural land, while a decrease was reported in 37 countries. In 42 countries, the organic agricultural area either did not change, or no new data was received.

The figures shown in the following tables and graphs with historical figures may differ from what was previously communicated, as data revisions were received and included in the FiBL database.

Table 5: World: Organic agricultural land (including in-conversion areas) by region: growth 2020 to 2021, and 10 years growth

Region	Organic agri. land 2020 [ha]	Organic agri. land 2021 [ha]	1 year growth [ha]	1 year growth [%]	10 years growth [ha]	10 years growth [%]
Africa	2'271'080	2'663'983	392'903	17.3%	1'594'287	149.0%
Asia	6'148'098	6'504'211	356'113	5.8%	2'818'062	76.5%
Europe	17'096'929	17'844'853	747'924	4.4%	7'296'330	69.2%
Latin America	9'938'337	9'870'887	-67'450	-0.7%	2'904'739	41.7%
Northern America	3'744'163	3'542'140	-202'023	-5.4%	522'453	17.3%
Oceania	35'908'876	35'985'809	76'932	0.2%	24'602'115	216.1%
World*	**75'099'762**	**76'403'777**	**1'304'015**	**1.7%**	**39'734'874**	**108.4%**

Source: FiBL survey 2023, based on data from government bodies, the private sector, and certifiers. For detailed data sources, see annex, page 338

** Total includes correction value for French Overseas Departments.*

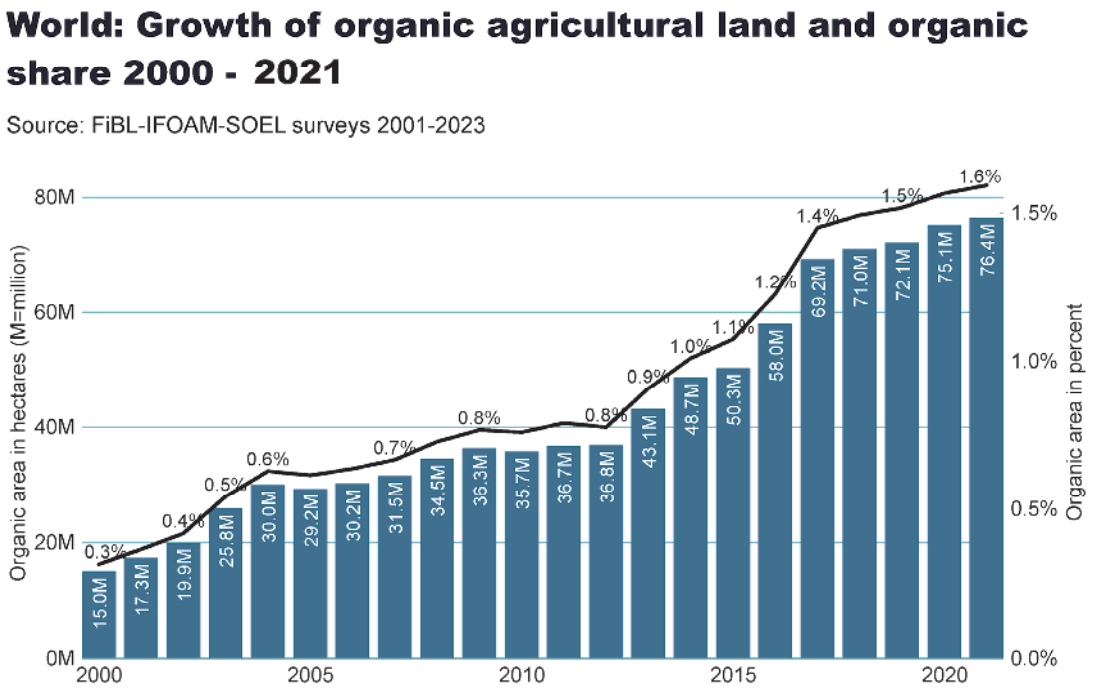


Figure 4: World: Growth of the organic agricultural land and organic share 2000-2021

Source: FiBL-IFOAM-SOEL surveys 2001-2023

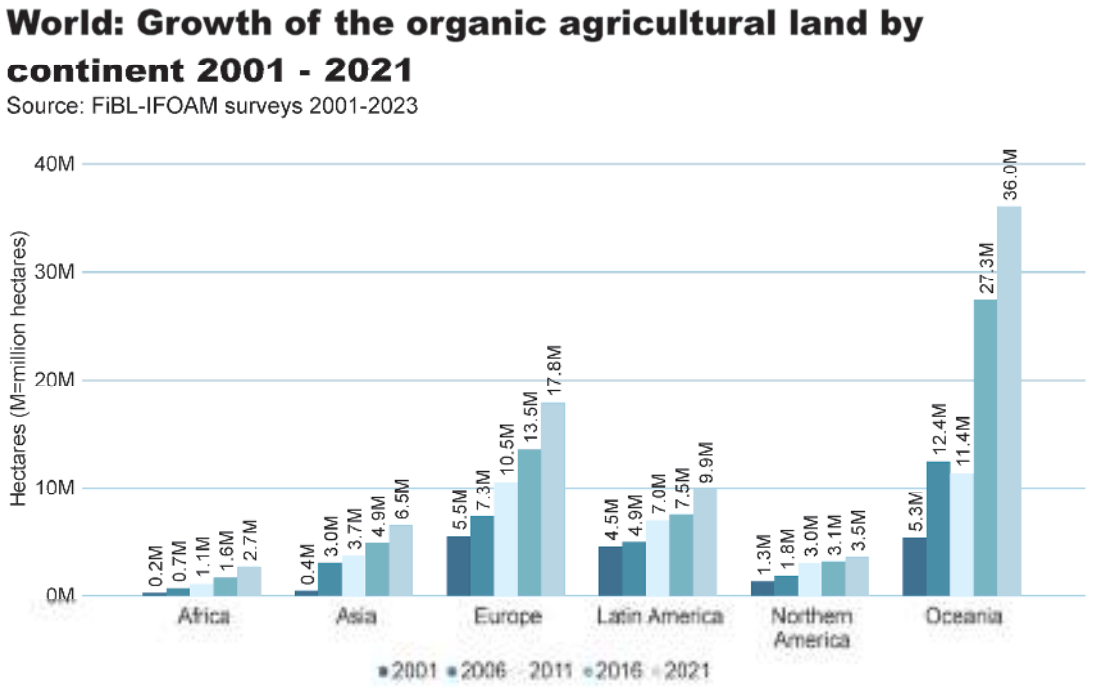


Figure 5: World: Growth of the organic agricultural land by continent 2000 to 2021

Source: FiBL-IFOAM-SOEL surveys 2001-2023

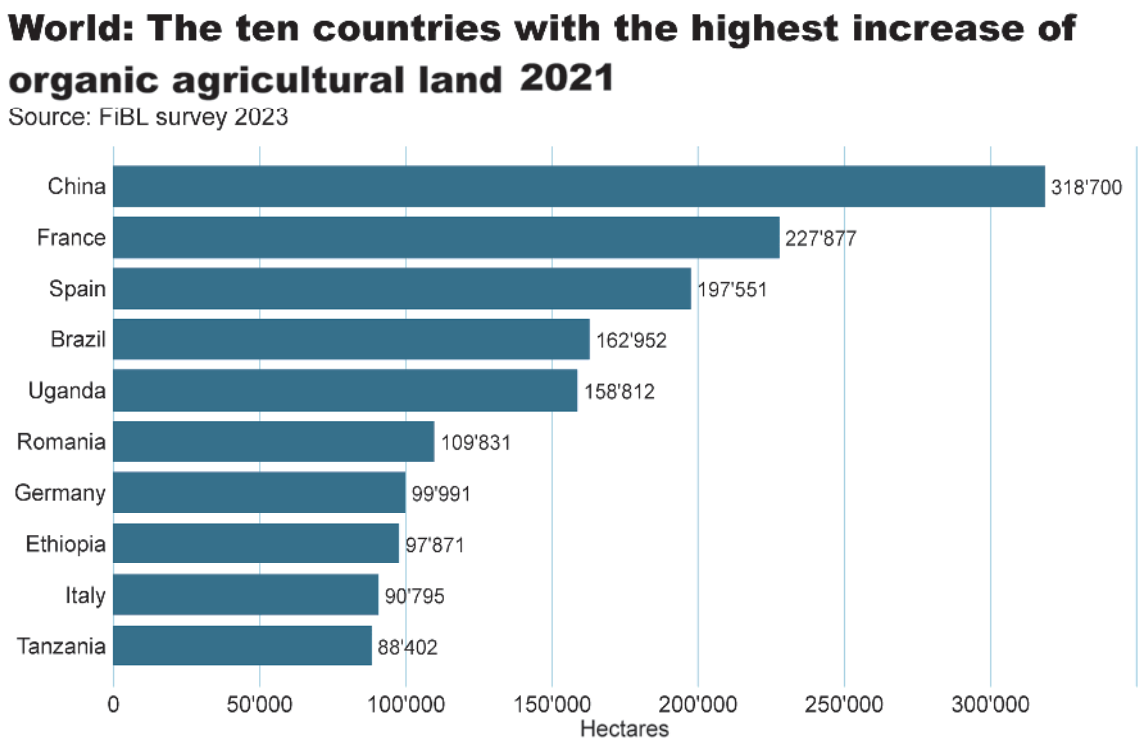


Figure 6: World: The ten countries with the highest increase of organic agricultural land 2021

Source: FiBL survey 2023, based on data from government bodies, the private sector, and certifiers. For detailed data sources, see annex, page 338

Table 6: World: Development of organic agricultural land by country 2020-2021

Important note: A direct year-to-year and ten years comparison is not always possible for many countries because the data sources may have changed over the years, or data access may have improved. The figures published here may differ from previously published data due to data revisions. Data are not available for all countries for every year, and in these cases, the figure for the previous year was used (see also page 338). On statistics.fibl.org, data back to 2000 is available.

Country/Territory	Organic agri. land 2020 [ha]	Organic agri. land 2021 [ha]	1 year growth [ha]	1 year growth [%]	10 years growth [ha]	10 years growth [%]
Afghanistan	98	98	0.0	0.0	36.4	59.4
Albania	887	1'094	207.2	23.4	533.9	95.3
Algeria	772	772	0.0	0.0	72.5	10.4
Andorra	2	2	0.1	5.5	2.1	
Angola			0.0		-2'486.0	-100.0
Argentina	4'453'639	4'074'804	-378'834.7	-8.5	437'338.3	12.0
Armenia	566	583	17.6	3.1	-226.7	-28.0
Australia	35'687'799	35'687'799	0.0	0.0	24'488'222.0	218.7
Austria	679'872	679'119	-753.0	-0.1	117'508.0	20.9
Azerbaijan	38'080	38'080	0.0	0.0	14'340.1	60.4
Bahamas	49	49	0.0	0.0	48.6	
Bangladesh	504	504	0.0	0.0	-45.9	-8.3

Country/Territory	Organic agri. land 2020 [ha]	Organic agri. land 2021 [ha]	1 year growth [ha]	1 year growth [%]	10 years growth [ha]	10 years growth [%]
Belarus	6'838	6'725	-112.8	-1.6	6'724.9	
Belgium	99'075	101'828	2'753.0	2.8	42'110.4	70.5
Belize	454	676	222.1	48.9	-76.4	-10.1
Benin	34'526	48'898	14'371.4	41.6	46'269.2	1'760.4
Bhutan	4'095	5'608	1'513.4	37.0	-547.5	-8.9
Bolivia	179'425	179'425	0.0	0.0	33'530.5	23.0
Bosnia and Herzegovina	1'692	2'495	803.3	47.5	2'152.5	627.8
Brazil	1'319'454	1'482'406	162'952.3	12.3	777'173.0	110.2
British Virgin Islands	26	26	0.0	0.0	26.1	
Bulgaria	116'253	86'310	-29'942.7	-25.8	47'173.5	120.5
Burkina Faso	66'175	79'285	13'109.8	19.8	64'284.9	428.6
Burundi	319	549	229.5	72.0	-1.5	-0.3
Cambodia	35'879	21'112	-14'766.9	-41.2	12'057.7	133.2
Cameroon	345	1'594	1'249.5	362.7	931.5	140.6
Canada	1'417'612	1'215'589	-202'022.5	-14.3	381'706.1	45.8
Cape Verde	3		-2.7	-100.0	0.0	
Channel Islands	180	180	0.0	0.0	-80.0	-30.8
Chile	156'819	152'773	-4'045.6	-2.6	130'136.8	574.9
China	2'435'000	2'753'700	318'700.0	13.1	853'700.0	44.9
Colombia	39'413	100'874	61'461.0	155.9	66'814.3	196.2
Comoros	1'004	937	-67.7	-6.7	-1'705.1	-64.5
Cong, Dem. Rep.	118'254	89'486	-28'767.7	-24.3	37'648.3	72.6
Cook Islands	15	15	0.0	0.0	-4.5	-22.6
Costa Rica	11'465	10'300	-1'164.9	-10.2	939.6	10.0
Côte d'Ivoire	79'125	78'783	-341.7	-0.4	59'326.2	304.9
Croatia	108'610	121'924	13'314.0	12.3	90'020.5	282.2
Cuba	2'129	2'129	0.0	0.0	-3'151.8	-59.7
Cyprus	5'918	7'738	1'820.0	30.8	3'815.0	97.2
Czech Republic	539'532	558'124	18'591.7	3.4	89'454.1	19.1
Denmark	299'998	299'998	0.0	0.0	124'885.0	71.3
Dominica		2'907	2'907.3		2'667.5	1'112.5
Dominican Republic	117'312	117'312	0.0	0.0	-51'666.2	-30.6
Ecuador	41'537	52'185	10'647.9	25.6	-4'118.5	-7.3
Egypt	116'000	116'000	0.0	0.0	30'199.0	35.2
El Salvador	2'565	2'565	0.0	0.0	-4'171.5	-61.9
Estonia	220'796	226'605	5'809.0	2.6	82'455.5	57.2
Eswatini	1'156	3'539	2'382.6	206.0	3'531.3	45'272.6
Ethiopia	234'648	332'519	97'871.0	41.7	167'742.6	101.8
Falkland Islands (Malvinas)	31'937	31'937	0.0	0.0	-371'275.0	-92.1
Faroe Islands	251	251	0.0	0.0	-1.9	-0.8
Fiji	19'303	30'194	10'890.8	56.4	28'030.2	1'295.3

Country/Territory	Organic agri. land 2020 [ha]	Organic agri. land 2021 [ha]	1 year growth [ha]	1 year growth [%]	10 years growth [ha]	10 years growth [%]
Finland	315'112	327'736	12'624.0	4.0	129'985.0	65.7
France	2'548'677	2'776'554	227'876.9	8.9	1'743'612.9	168.8
French Guiana	3'690	3'886	196.0	5.3	1'479.0	61.4
French Polynesia	1'562	1'592	30.7	2.0	-876.5	-35.5
Georgia	1'452	4'278	2'825.9	194.6	2'278.4	114.0
Germany	1'702'240	1'802'231	99'991.0	5.9	767'876.0	74.2
Ghana	72'847	38'260	-34'586.2	-47.5	10'099.5	35.9
Greece	534'629	534'629	0.0	0.0	72'011.0	15.6
Grenada	84	195	111.4	132.6	110.0	128.7
Guadeloupe (France)	858	1'300	442.0	51.5	1'136.0	692.7
Guatemala	87'028	71'654	-15'374.0	-17.7	58'273.6	435.5
Guyana			0.0		-4'249.0	-100.0
Haiti	2'907	2'739	-168.6	-5.8	1'932.8	239.9
Honduras	66'179	66'179	0.0	0.0	41'229.2	165.2
Hungary	301'430	293'597	-7'833.0	-2.6	162'988.0	124.8
Iceland	4'709	6'440	1'730.6	36.7	-1'800.1	-21.8
India	2'657'889	2'657'889	0.0	0.0	2'157'889.3	431.6
Indonesia	75'793	83'362	7'569.1	10.0	-4'885.6	-5.5
Iran	11'916	7'053	-4'863.0	-40.8	-35'580.6	-83.5
Iraq	63	63	0.0	0.0	62.5	
Ireland	74'666	86'868	12'202.0	16.3	34'075.0	64.5
Israel	6'287	5'778	-508.5	-8.1	-409.2	-6.6
Italy	2'095'364	2'186'159	90'795.2	4.3	1'018'797.2	87.3
Jamaica	10	11	0.9	9.5	-531.1	-98.0
Japan	11'992	11'992	0.0	0.0	1'381.0	13.0
Jordan	1'446	1'446	0.0	0.0	-1'449.1	-50.1
Kazakhstan	114'886	113'247	-1'638.8	-1.4	-177'955.8	-61.1
Kenya	123'744	128'018	4'273.9	3.5	123'124.0	2'515.9
Kosovo	1'604	1'990	386.0	24.1	1'879.0	1'692.8
Kuwait	33	32	-0.7	-2.1	32.1	
Kyrgyzstan	30'259	30'259	0.0	0.0	27'562.6	1'022.4
Lao	3'266	7'993	4'726.9	144.7	2'003.6	33.5
Latvia	291'150	291'150	0.0	0.0	95'492.0	48.8
Lebanon	1'715	1'671	-43.4	-2.5	-1'632.1	-49.4
Lesotho			0.0		-616.8	-100.0
Liberia		2'791	2'791.0		2'791.0	
Liechtenstein	1'490	1'423	-67.4	-4.5	337.1	31.0
Lithuania	235'471	261'782	26'311.0	11.2	105'242.8	67.2
Luxembourg	6'118	6'893	775.2	12.7	2'763.0	66.9
Madagascar	103'817	95'083	-8'734.0	-8.4	64'818.3	214.2
Malawi	232	324	92.2	39.7	288.8	815.8
Malaysia	1'276	1'276	0.0	0.0	673.2	111.6

Country/Territory	Organic agri. land 2020 [ha]	Organic agri. land 2021 [ha]	1 year growth [ha]	1 year growth [%]	10 years growth [ha]	10 years growth [%]
Mali	14'675	17'840	3'165.0	21.6	2'913.6	19.5
Malta	67	66	-1.4	-2.1	28.6	77.2
Martinique (France)	683	706	23.0	3.4	506.0	253.0
Mauritius	5	13	7.6	154.6	-3.4	-21.3
Mayotte	87	114	26.9	30.9	114.0	
Mexico	215'634	238'075	22'440.8	10.4	-249'318.4	-51.2
Moldova	27'624	28'368	744.4	2.7	6'266.0	28.4
Mongolia	241	241	0.0	0.0	241.4	
Montenegro	4'823	4'404	-418.8	-8.7	1'335.9	43.5
Morocco	11'452	11'452	0.0	0.0	-5'147.6	-31.0
Mozambique	14'438	41'048	26'610.2	184.3	37'208.3	969.0
Myanmar	10'143	10'143	0.0	0.0	9'245.7	1'030.8
Namibia		384	383.7		-13'739.0	-97.3
Nepal	9'361	2'448	-6'912.9	-73.9	-7'825.5	-76.2
Netherlands	71'607	76'375	4'768.0	6.7	28'337.0	59.0
New Caledonia	800	800	0.0	0.0	800.0	
New Zealand	79'347	79'347	0.0	0.0	-27'406.0	-25.7
Nicaragua	39'076	37'357	-1'718.8	-4.4	3'735.9	11.1
Niger			0.0		-106.0	-100.0
Nigeria	54'995	58'028	3'032.8	5.5	48'507.2	509.5
Niue	43	117	73.8	170.9	55.7	90.9
North Macedonia	3'727	7'794	4'067.0	109.1	-4'937.2	-38.8
Norway	45'181	45'112	-69.0	-0.2	-10'148.0	-18.4
Oman	4	7	2.2	50.0	-31.7	-82.8
Pakistan	69'850	69'850	0.0	0.0	47'453.1	211.9
Palestine	5'218	5'517	299.0	5.7	-837.0	-13.2
Panama	5'929	5'929	0.0	0.0	1'353.0	29.6
Papua New Guinea	72'477	88'014	15'536.2	21.4	76'215.6	646.0
Paraguay	73'428	113'147	39'718.9	54.1	61'956.9	121.0
Peru	342'701	374'926	32'225.5	9.4	177'088.9	89.5
Philippines	191'770	216'334	24'564.5	12.8	135'360.4	167.2
Poland	509'286	509'286	0.0	0.0	-152'670.0	-23.1
Portugal	319'540	308'289	-11'251.1	-3.5	108'137.9	54.0
Republic of Korea	38'540	40'663	2'123.0	5.5	15'196.0	59.7
Réunion (France)	1'901	2'100	199.0	10.5	1'506.0	253.5
Romania	468'887	578'718	109'831.0	23.4	290'457.0	100.8
Russian Federation	615'188	655'457	40'269.3	6.5	509'206.7	348.2
Rwanda	5'188	4'696	-491.2	-9.5	991.9	26.8
Saint Lucia		25	25.0		25.0	
Samoa	40'992	82'299	41'307.3	100.8	48'784.3	145.6
Sao Tome & Principe	9'103	9'291	187.5	2.1	5'240.3	129.4
Saudi Arabia	26'632	27'110	478.0	1.8	13'541.3	99.8

Country/Territory	Organic agri. land 2020 [ha]	Organic agri. land 2021 [ha]	1 year growth [ha]	1 year growth [%]	10 years growth [ha]	10 years growth [%]
Senegal	3'809	3'262	-547.4	-14.4	-3'474.4	-51.6
Serbia	19'317	23'527	4'210.4	21.8	17'187.3	271.1
Seychelles	0		0.0		0.0	
Sierra Leone	190'130	193'954	3'824.0	2.0	193'954.2	
Singapore	15	15	0.0	0.0	14.6	
Slovakia	222'896	222'896	0.0	0.0	56'196.0	33.7
Slovenia	52'078	52'078	0.0	0.0	16'977.0	48.4
Solomon Islands	3'367	8'231	4'864.1	144.5	6'923.7	529.7
South Africa	40'954	97'359	56'405.2	137.7	54'188.9	125.5
Spain	2'437'891	2'635'442	197'551.0	8.1	1'042'245.0	65.4
Sri Lanka	73'393	66'623	-6'769.8	-9.2	47'105.8	241.4
Sudan		960	960.0		-53'885.0	-98.2
Suriname	52	52	0.0	0.0	51.8	
Sweden	610'543	606'669	-3'874.0	-0.6	128'984.0	27.0
Switzerland	177'347	181'444	4'097.6	2.3	59'656.2	49.0
Syrian Arab Republic			0.0		-19'987.0	-100.0
Taiwan	10'789	11'765	976.0	9.0	5'915.6	101.1
Tajikistan	11'818	22'292	10'474.0	88.6	9'520.5	74.5
Tanzania	198'226	286'627	88'401.7	44.6	100'090.3	53.7
Thailand	160'802	167'985	7'183.2	4.5	135'408.4	415.7
Timor-Leste	32'311	32'311	0.0	0.0	7'621.3	30.9
Togo	127'782	130'858	3'076.3	2.4	126'968.9	3'264.5
Tonga	1'119	1'119	0.0	0.0	720.8	181.1
Tunisia	297'137	279'389	-17'747.9	-6.0	142'201.1	103.7
Türkiye	382'639	327'583	-55'055.8	-14.4	-196'043.8	-37.4
Uganda	346'496	505'308	158'812.0	45.8	274'151.0	118.6
Ukraine	462'225	422'299	-39'926.0	-8.6	149'449.0	54.8
United Arab Emirates	5'419	5'419	0.0	0.0	1'514.0	38.8
United Kingdom	473'500	489'200	15'700.0	3.3	-100'809.0	-17.1
United States of America	2'326'551	2'326'551	0.0	0.0	148'079.6	6.8
Uruguay	2'742'368	2'741'845	-522.5	0.0	1'810'880.1	194.5
Uzbekistan	3'781	4'925	1'144.2	30.3	4'712.2	2'212.3
Vanuatu	2'052	6'281	4'229.6	206.2	2'175.0	53.0
Venezuela	1'490	2'496	1'005.5	67.5	2'437.0	4'165.8
Viet Nam	65'520	74'540	9'020.0	13.8	38'254.5	105.4
Zambia	691	3'376	2'685.0	388.5	-225.7	-6.3
Zimbabwe	1'043	1'085	41.6	4.0	458.6	73.2
Total	**75'099'762**	**76'403'777**	**1'304'015**	**1.7**	**39'570'802**	**107.4**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see previous editions of "The World of Organic Agriculture" and annex, page 338
**Total includes correction value for French overseas departments.*

Further organic areas

Apart from land dedicated to organic agriculture, there are further areas of organic land dedicated to other activities. The largest part of these are wild collection areas and areas for beekeeping. Further non-agricultural areas include aquaculture, forests, and grazing areas on non-agricultural land. These areas totalled 31.8 million hectares, and all the organic areas together summed up to 108.3 million hectares.

It should be noted that many countries do not report non-agricultural organic areas. We can, therefore, assume that the data on the other areas are incomplete.

For organic aquaculture and beekeeping, other indicators (production and number of beehives) are more relevant than the area, and the significance of organic aquaculture and beekeeping cannot be measured in hectares (Table 23, Table 25). While some area data on aquaculture are available, it should be noted that it is not complete.

For more information on aquaculture and beekeeping, see pages 81 and 80. More information on the use of the wild collection areas is available in the corresponding chapter, page 76.

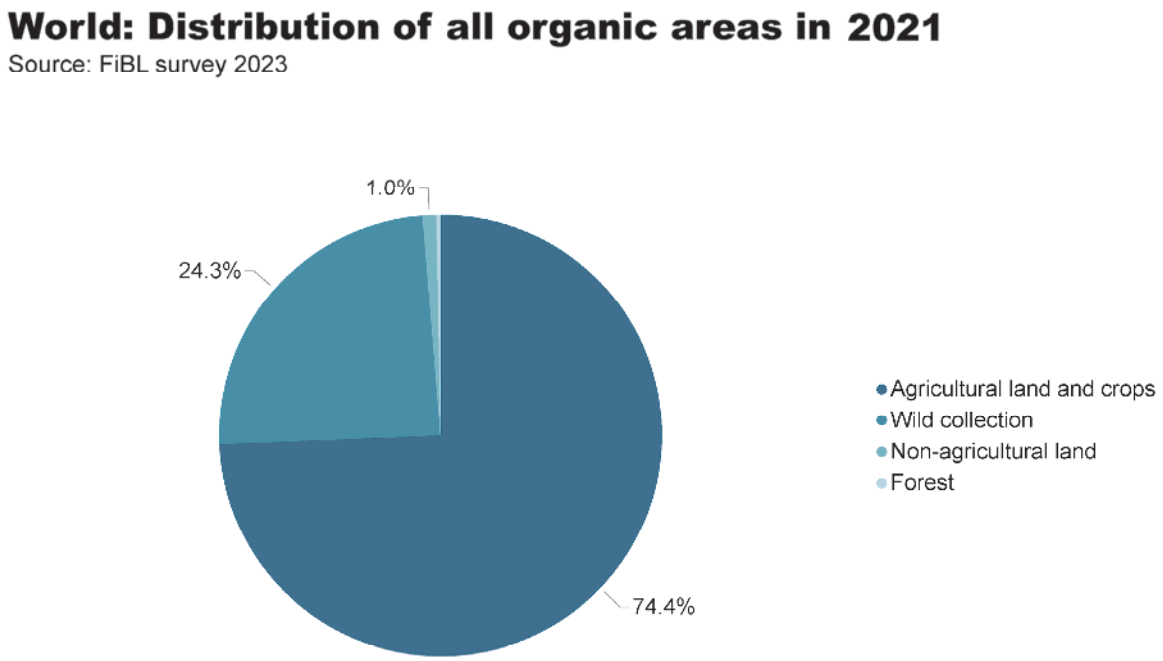


Figure 7: World: Distribution of all organic areas 2021. Total: 108.3 million hectares

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Table 7: World: Organic areas: Agricultural land (including conversion areas) and further organic areas by region in 2021

Region	Agricul-ture [ha]	Aqua-culture [ha]	Forest [ha]	Wild collection [ha]*	Other non-agri. land [ha]	Total [ha]
Africa	2'663'980	1	41'795	12'756'436	25	15'462'237
Asia	6'504'210	48'250		3'815'281	1	10'367'742
Europe	17'844'856		843'959	10'585'464	41	29'274'319
Latin America	9'870'888		40'623	2'377'015	996'100	13'284'626
North America	3'542'140		213'703	8'406		3'764'249
Oceania	35'985'809			121'794		36'107'603
World**	**76'403'777**	**48'251**	**1'140'081**	**29'664'396**	**996'166**	**108'252'670**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338; Blank cells: No data available.
**Wild collection and beekeeping areas; **Total includes correction value for French overseas departments.*

Table 8: World: Organic areas: Agricultural land (including conversion areas) and further organic areas by country 2021

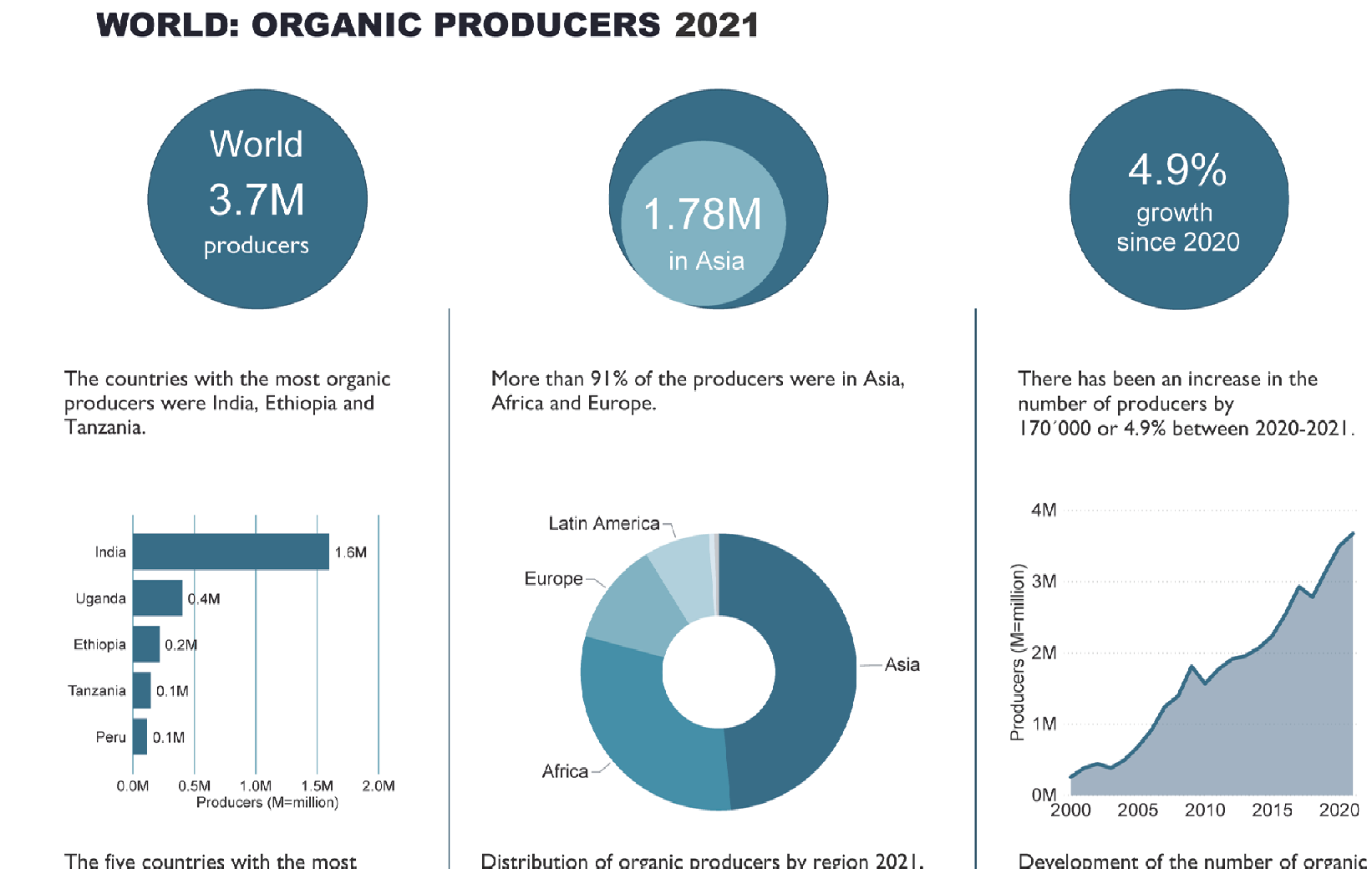
Country/Territory	Agriculture [ha]	Aqua-culture [ha]	Forest [ha]	Wild collection [ha]*	Other non-agri. land [ha]	Total [ha]
Afghanistan	98					98
Albania	1'094		662'790	475'136		1'139'020
Algeria	772					772
Andorra	2					2
Argentina	4'074'804			20'559		4'095'363
Armenia	583			3'852		4'435
Australia	35'687'799					35'687'799
Austria	679'119					679'119
Azerbaijan	38'080	573		2'126		40'779
Bahamas	49					49
Bangladesh	504	5'781				6'285
Belarus	6'725					6'725
Belgium	101'830					101'830
Belize	676					676
Benin	48'897					48'897
Bhutan	5'608			2'223		7'831
Bolivia	179'425			672'328		851'753
Bosnia and Herzegovina	2'495			195'668		198'163
Botswana				6'380		6'380
Brazil	1'482'406		15	13'761		1'496'183
British Virgin Islands	26					26
Bulgaria	86'310					86'310
Burkina Faso	79'285			87'760		167'045
Burundi	549					549
Cambodia	21'112			8		21'120
Cameroon	1'594			4'600		6'194
Canada	1'215'589		8'507	7'810		1'231'907
Chad				808'806		808'806
Channel Islands	180					180

Country/Territory	Agriculture [ha]	Aqua-culture [ha]	Forest [ha]	Wild collection [ha]*	Other non-agri. land [ha]	Total [ha]
Chile	152'773			105'127		257'899
China	2'753'700			2'004'000		4'757'700
Colombia	100'874			33'750		134'624
Congo, Dem republic of	89'486					89'486
Comoros	937					937
Cook Islands	15					15
Costa Rica	10'300					10'300
Côte d'Ivoire	78'783					78'783
Croatia	121'924					121'924
Cuba	2'129					2'129
Cyprus	7'738					7'738
Czech Republic	558'124					558'124
Denmark	299'998					299'998
Dominica	2'907					2'907
Dominican Republic	117'312			3'081		120'393
Ecuador	52'185		40'007	942		93'134
Egypt	116'000					116'000
El Salvador	2'564					2'564
Estonia	226'605			445'512		672'117
Eswatini	3'539					3'539
Ethiopia	332'519			7'163		339'682
Falkland Islands (Malvinas)	31'937					31'937
Faroe Islands	251					251
Fiji	30'194					30'194
Finland	327'737			6'928'693		7'256'430
France	2'776'554					2'776'554
French Guiana	3'886		406	70		4'362
French Polynesia	1'592			115'930		117'522
Georgia	4'278					4'278
Germany	1'802'231					1'802'231
Ghana	38'260			142'232		180'493
Greece	534'629					534'629
Grenada	195			0		195
Guadeloupe (France)	1'300		108	7		1'416
Guatemala	71'654			169'089		240'743
Guyana				55'449		55'449
Haiti	2'738					2'738
Honduras	66'179					66'179
Hungary	293'597					293'597
Iceland	6'440		48	454'382		460'870
India	2'657'889			1'681'296		4'339'185
Indonesia	83'362	795		231		84'387
Iran	7'051			4	1	7'056
Iraq	63					63
Ireland	86'868					86'868
Israel	5'778			3		5'781
Italy	2'186'159					2'186'159
Jamaica	11			7		18
Japan	11'992					11'992
Jordan	1'446					1'446
Kazakhstan	113'247					113'247
Kenya	128'018			355'530		483'548
Kosovo	1'990			373'488		375'478

Country/Territory	Agriculture [ha]	Aqua-culture [ha]	Forest [ha]	Wild collection [ha]*	Other non-agri. land [ha]	Total [ha]
Kuwait	32					32
Kyrgyzstan	30'259					30'259
Lao	7'993					7'993
Latvia	291'150					291'150
Lebanon	1'671			258		1'929
Lesotho				1'551'891		1'551'891
Liberia	2'791					2'791
Liechtenstein	1'423					1'423
Lithuania	261'782					261'782
Luxembourg	6'893					6'893
Madagascar	95'082		218	3'235		98'535
Malawi	324					324
Malaysia	1'276					1'276
Mali	17'840			14'795		32'635
Malta	66					66
Martinique (France)	706		87			793
Mauritius	13					13
Mayotte	114					114
Mexico	238'075			1'079'967	7'463	1'325'504
Moldova	28'368			1'351		29'719
Mongolia	242					242
Montenegro	4'404					4'404
Morocco	11'452			335'306		346'759
Mozambique	41'048			1'842'285		1'883'333
Myanmar	10'143	20				10'163
Namibia	384			2'313'989	24	2'314'397
Nepal	2'448			24'394		26'842
Netherlands	76'375					76'375
New Caledonia	800					800
New Zealand	79'347					79'347
Nicaragua	37'357			3'494		40'851
Nigeria	58'028					58'028
Niue	117					117
North Macedonia	7'794			556'600		564'394
Norway	45'112					45'112
Oman	7			2'200		2'207
Pakistan	69'850					69'850
Palestine	5'517					5'517
Panama	5'929					5'929
Papua New Guinea	88'014					88'014
Paraguay	113'147				988'604	1'101'751
Peru	374'926			219'384		594'310
Philippines	216'334			0		216'334
Poland	509'286					509'286
Portugal	308'289					308'289
Republic of Korea	40'663					40'663
Réunion (France)	2'100		74	2		2'176
Romania	578'718					578'718
Russian Federation	655'457		0	801'704		1'457'162
Rwanda	4'696					4'696
Saint Lucia	25				33	58
Samoa	82'299			5'864		88'164
Sao Tome and Principe	9'291					9'291
Saudi Arabia	27'110					27'110
Senegal	3'262			15'258		18'520

Country/Territory	Agriculture [ha]	Aqua-culture [ha]	Forest [ha]	Wild collection [ha]*	Other non-agri. land [ha]	Total [ha]
Serbia	23'528					23'528
Seychelles				1'223		1'223
Sierra Leone	193'954					193'954
Singapore	15					15
Slovakia	222'896					222'896
Slovenia	52'078					52'078
Solomon Islands	8'231					8'231
Somalia				1'364'697		1'364'697
South Africa	97'359		137	991'562	1	1'089'058
Spain	2'635'442		163'710			2'799'152
Sri Lanka	66'623					66'623
Sudan	960			98'044		99'004
Suriname	52					52
Sweden	606'669					606'669
Switzerland	181'444					181'444
Taiwan	11'765					11'765
Tajikistan	22'292					22'292
Tanzania	286'627			2'762		289'389
Thailand	167'985	458		90'742		259'186
Timor-Leste	32'311					32'311
Togo	130'858					130'858
Tonga	1'119					1'119
Tunisia	279'389	1	41'366			320'757
Türkiye	327'583			24'334		351'917
Uganda	505'307			66		505'373
Ukraine	422'299		11	328'596	41	750'946
United Arab Emirates	5'419			2		5'421
United Kingdom	489'200		17'400			506'600
United States of America	2'326'551		205'196	596		2'532'342
Uruguay	2'741'845					2'741'845
Uzbekistan	4'925					4'925
Vanuatu	6'281					6'281
Venezuela	2'496					2'496
Viet Nam	74'540	40'623		3'943		119'105
Zambia	3'376			2'500'000		2'503'376
Zimbabwe	1'085			308'850		309'935
World**	**76'403'777**	**48'251**	**1'140'081**	**29'664'396**	**996'166**	**108'252'670**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338; Blank cells: No data available.
**Wild collection and beekeeping areas, **Total includes correction value for French overseas departments.*



Infographic 3: Organic producers 2021

Source: FiBL survey 2023

Organic producers and other operator types

Producers

There were almost 3.7 million organic producers worldwide in 2021.

– According to the data obtained, more than 91 percent of the producers were in Asia, Africa, and Europe (Table 9, Figure 8).
– The country with the most organic producers was India, followed by Uganda and Ethiopia (Table 10, Figure 9).
– There has been an increase in the number of producers of more than 170'000, or 4.9 percent, compared to 2020. In Africa, Oceania, Latin America, Europe and Northern America, the number of producers increased. Only in Asia there was a slight decrease in 2021 (Table 9).

Reporting precise figures on the number of organic farms remains difficult as some countries:

- report only the numbers of companies, projects, or grower groups, which may each comprise many individual producers;
- do not provide data on the number of producers at all;
- include collectors in case there are wild collection areas, and
- provide the number of producers per crop, and there may be overlaps for those growers who grow several crops.

The number of producers should, therefore, be treated with caution, and it may be assumed that the total number of organic producers is higher than that reported here.

Table 9: World: Development of the numbers of producers by region

Region	2020 [no.]	2021 [no.]	1 year growth [no.]	1 year growth [%]	10 years growth [no.]	10 years growth [%]
Africa	968'233	1'123'255	155'022	16.0%	595'342	112.8%
Asia	1'811'209	1'782'134	-29'075	-1.6%	1'171'012	191.6%
Europe	417'987	442'274	24'287	5.8%	152'646	52.7%
Latin America	262'115	280'436	18'321	7.0%	-27'111	-8.8%
Northern America	22'448	23'392	944	4.2%	6'794	40.9%
Oceania	15'930	18'479	2'549	16.0%	4'293	30.3%
World	**3'496'898**	**3'669'201**	**172'303**	**4.9%**	**1'902'412**	**107.7%**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

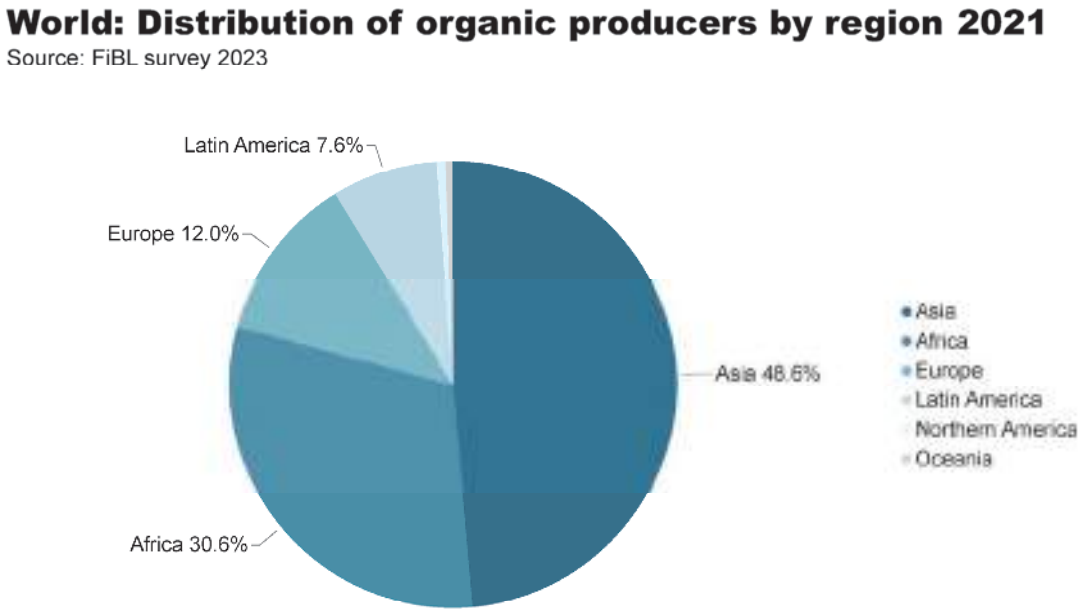


Figure 8: World: Distribution of organic producers by region 2021 (Total: 3.7 million producers)

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

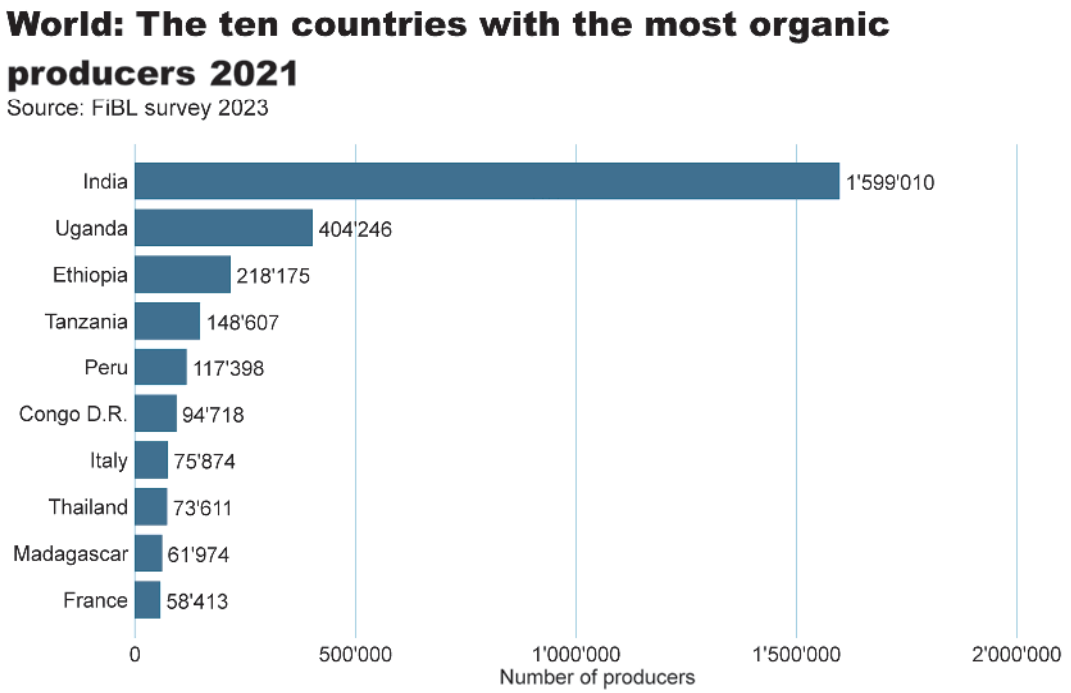


Figure 9: World: The ten countries with the largest numbers of organic producers 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Further operator types

Regarding data on further operator types, there are over 118'000 processors and approximately 8'400 importers, most of them in Europe. However, not all countries reported the number of processors, exporters, importers, or other operator types. For instance, data for the United States is missing, and it can be assumed that the number of processors, importers, and exporters is far higher than what is indicated in Table 10.

Further operator types reported but not listed here were beekeepers, smallholder groups, and aquaculture enterprises, as well as the number of collectors (wild collection).

Table 10: World: Organic producers and other operator types by country 2021

For many countries (particularly those with no private or governmental data collection system), data on the various operator types are missing or incomplete. Please note that for some countries data is compiled from several sources (i.e. several certifiers), not all of which were updated.

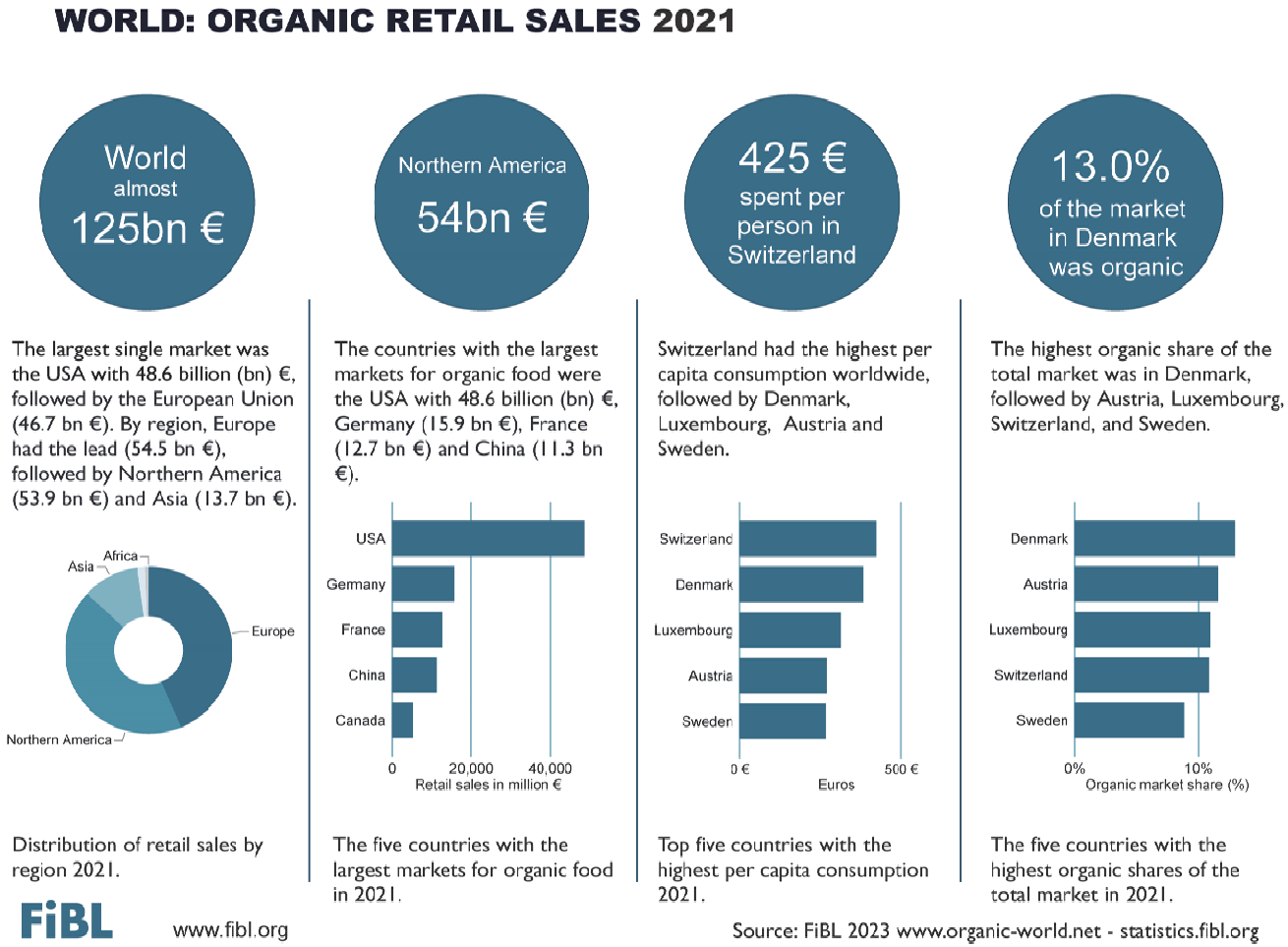
Country/Territory	Producers[1]	Processors	Importers	Exporters
Afghanistan		2		2
Albania	130	62		26
Algeria	64	3	1	2
Andorra		3		
Argentina	1'336	476		99
Armenia	27			
Australia	1'829	2'077	161	299
Austria	23'961	1'691	58	4
Azerbaijan	446	446		
Bahrain		1		
Belarus	19	20		11
Belgium	2'590	1'585	304	153
Belize	385	1		
Benin	9'046	5		11
Bhutan	1'998	227		3
Bolivia	14'161	7'619		233
Bosnia and Herzegovina	90	51		20
Botswana	1	1		1
Brazil	28'667	15		
Brunei Darussalam		1		
Bulgaria	5'942	249	22	2
Burkina Faso	27'021	28		69
Burundi	668	1		
Cambodia	4'135	34		31
Cameroon	632			
Canada	6'916	1'827		
Chad	2'960	4		3
Chile	3'288	325		88
China	14'847	4'669	288	2'605
Colombia	171			89
Comoros	637	7		7
Congo Dem. Rep.	94'718	20		18
Cook Islands	58			
Costa Rica	47			50
Côte d'Ivoire	2'990	14		25
Croatia	6'024	378	12	
Cuba	8	4		1
Cyprus	1'292	70	28	0
Czech Republic	4'797	930	359	163
Denmark	4'186	1'162	101	104
Dominica	258	2		
Dominican Republic	15'563			136

[1] Some countries report only the numbers of companies, projects or grower groups, which may each compromise a number of producers.

Country/Territory	Producers[1]	Processors	Importers	Exporters
Ecuador	8'398	32	12	180
Egypt	970	242		242
El Salvador	374	10		
Equatorial Guinea				
Estonia	2'043	195	47	24
Eswatini	3	1		1
Ethiopia	218'175	83		42
Falkland Islands (Malvinas)	3			
Faroe Islands	1	1		
Fiji	13			
Finland	5'007	414	56	37
France	58'413	19'311	662	
French Guiana (France)	69	9		
French Polynesia	19			
Georgia	729	2		
Germany	36'307	19'572	2'016	
Ghana	3'433	24		38
Greece	29'869	1'653	45	40
Grenada	5	3		
Guadeloupe (France)	186	16	1	
Guatemala	141	82	7	132
Guinea		0		3
Guyana		1		1
Haiti	4'631	1		7
Honduras	15'046	59	58	
Hong Kong		1		
Hungary	5'129	489	61	0
Iceland	30	20	8	3
India	1'599'010	1'703		
Indonesia	17'836	169		347
Iran (Islamic Republic of)	346	28		
Ireland	1'914	215	156	58
Israel	345	153	91	41
Italy	75'874	23'802	579	1'036
Jamaica	2	2		
Japan	3'678	3'361	302	
Jordan	23	5		4
Kazakhstan	281	2	7	
Kenya	44'565	22	1	82
Kosovo	56	19		
Kuwait		1		1
Kyrgyzstan	1'144	4		3
La	1'519	2		2
Latvia	4'171	65	5	0
Lebanon	124	58	4	1
Lesotho	10	1		1
Liechtenstein	47			
Lithuania	2'529	121	1	
Luxembourg	123	107	8	0
Madagascar	61'974			
Malawi	3	1	1	1
Malaysia	30	26		21
Mali	11'608	1		9
Malta	25	16	54	0
Martinique (France)	77	26		
Mauritius		6		6
Mayotte	9			
Mexico	52'274	677		
Moldova	151	21	3	40
Monaco		2		
Mongolia	314			
Montenegro	422	25		0
Morocco	423	253		83
Mozambique	1'358	11		9
Myanmar	68	17		17
Namibia	15	13		2
Nepal	1'048	23		
Netherlands	1'985	995	533	146
New Zealand	685	345		119
Nicaragua	10'912	32		61

Country/Territory	Producers[1]	Processors	Importers	Exporters
Niger		0		0
Nigeria	2'308	13		6
Niue	2			
North Macedonia	887	17	8	1
Norway	1'778	471	103	0
Oman	1			
Pakistan	934	55		53
Palestine	1'632	41		4
Panama	18	2		6
Papua New Guinea	12'827			
Paraguay	5'591			61
Peru	117'398			
Philippines	13'069	88		77
Poland	18'598	668	267	319
Portugal	13'263	1'296	66	31
Puerto Rico		1		
Republic of Korea	25'362	729		
Réunion (France)	427	36	3	
Romania	11'562	209	34	25
Russian Federation	66	19		
Rwanda	8'930	6		4
Saint Lucia	1			
Samoa	1'993	1		2
Sao Tome and Principe	4'201			8
Saudi Arabia	400	1		2
Senegal	18'372	20		16
Serbia	458	152	74	82
Sierra Leone	5'507	9		3
Singapore		20	10	14
Slovakia	716	119	43	5
Slovenia	3'685	139	28	0
Solomon Islands	898			
Somalia	4	2		1
South Africa	1'307	213	9	107
Spain	52'861	5'921	472	230
Sri Lanka	1'940	258		275
Sudan	1	1		
Suriname	1	1		1
Sweden	5'360	1'128	361	27
Switzerland	7'670	1'427	520	15
Taiwan	4'436			
Tajikistan	166			1
Tanzania	148'607	7		6
Thailand	73'611	294		
Timor-Leste	3	3		4
Togo	19'709	4		28
Tonga	81	1		1
Tunisia	7'101	669	6	159
Türkiye	48'244	227	280	516
Uganda	404'246			
Ukraine	418	73		
United Arab Emirates	152	16		14
United Kingdom	3'581	2'566	216	
United States of America	16'476			
United States Virgin Islands		1		
Uruguay	1'417	15		15
Uzbekistan	26			
Vanuatu	74			
Venezuela	8	3		1
Viet Nam	12'453	3'314	40	60
Zambia	10'872	9		8
Zimbabwe	10'379	9		10
Total	**3'669'201**	**118'747**	**8'592**	**9'292**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338. Total includes correction value for French overseas departments.
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Infographic 4: Organic retail sales 2021

Source: FiBL survey 2023

Retail sales[1]

Whereas Amarjit Sahota presents global trends for the organic market along with much background information (page 134), in this chapter, we show the country-related market data that was compiled under the framework of the FiBL survey on organic agriculture.

Data on total retail sales value was available for 48 countries (about one-quarter of the total countries with organic data), which means that for many countries with organic farming activities, such data is missing.

Total retail sales, according to the FiBL survey, amounted to almost 125 billion euros in 2021, representing an estimated increase of approximate 3 percent and thus a considerably slower increase than in 2020, when due to the Corona pandemic the market increased by more than 10 percent.

- The country with the **largest market for organic food was the United States** (48.6 billion euros), followed by Germany (15.9 billion euros), France (12.7 billion euros) and China (11.3 billion euros).
- The **largest single market was the United States**, followed by the European Union (46.7. billion euros) and China (Figure 86).
- **By region, Europe had the lead** (54.5 billion euros), followed by North America (53.9 billion euros) and Asia (13.7 billion euros) (Figure 11).
- Market growth was noted in most countries for which 2021 data were available, but only in three cases it was in the double digits. **Estonia was the country that registered the biggest growth**; the market increased by 21.0 percent.
- Whereas the highest per capita consumption by region was in Northern America (143.7 euros[2]), by country, it was highest in Europe. In 2021**, Switzerland had the highest per capita consumption** (425 euros) worldwide, followed by Denmark (384 euros), Luxembourg (313 euros) and Austria (268 euros) (Table 12).
- Looking at the **shares the organic market has of the total market, the leader is Denmark** (13.0 percent), followed by Austria (11.6 percent), Luxembourg (11.0 percent) and Switzerland (10.9 percent) (Table 12).

[1] Please note that due to differences in the methodology, some of the figures presented in this chapter differ from those collected in by Ecovia Intelligence (see chapter by Amarjit Sahota).

[2] Please note that due to the fluctuating euro – US dollar exchange rate, this number is lower than what we communicated in the 2022 edition of this yearbook.

Table 11: Global market data: Retail sales and per capita consumption by region 2021

Region	Retail sales [Million €][1]	Per capita consumption [€]
Africa	No data	No data
Asia	13'747	3.0
Europe	54'539	65.7
Latin America*	778	1.2
Northern America	53'901	143.7
Oceania	1'866	41.9
Total	**124'845**	**15.7**

Source: FiBL-AMI survey 2023, based on data from government bodies, the private sector and market research companies. For data sources, see annex, page 338.
**Data from Belize, Brazil, Chile, Jamaica, Mexico, and Peru, some of which have not been updated for several years.*

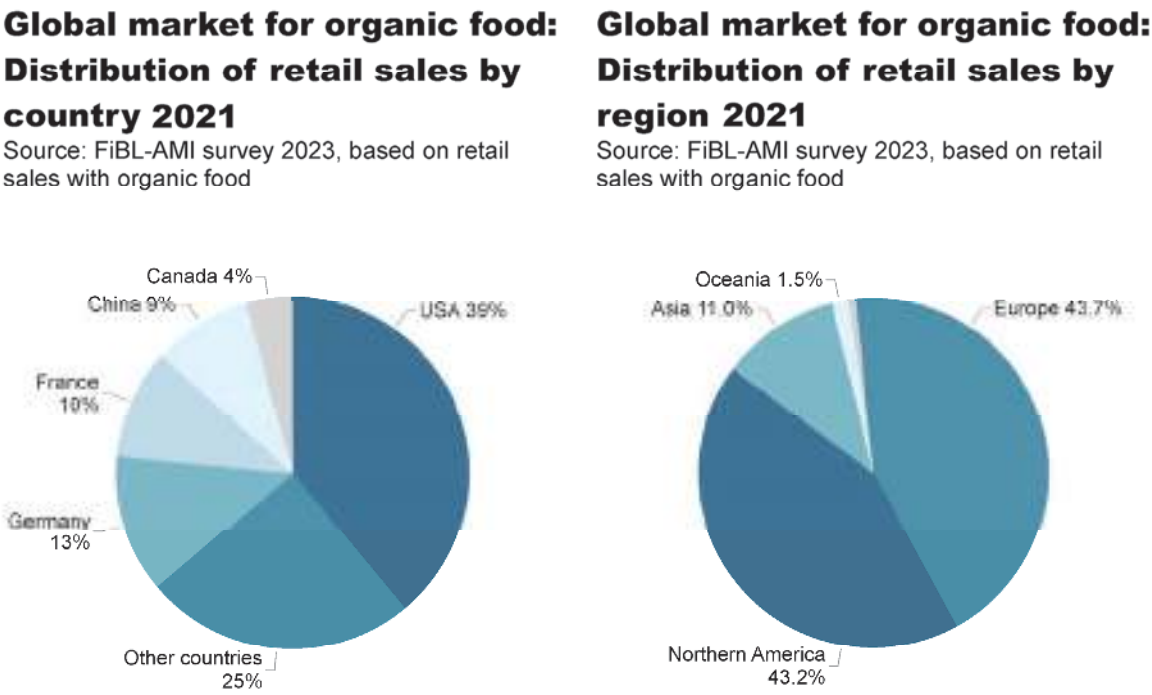


Figure 10: Global market for organic food: Distribution of retail sales by country 2021

Figure 11: Global market for organic food: Distribution of retail sales by region 2021

Source: FiBL-AMI survey 2023, based on data from government bodies, the private sector and market research companies. For data sources, see annex, page 338

[1] According to the Central European Bank, 1 euro corresponded to 1.1827 US dollars in 2021.

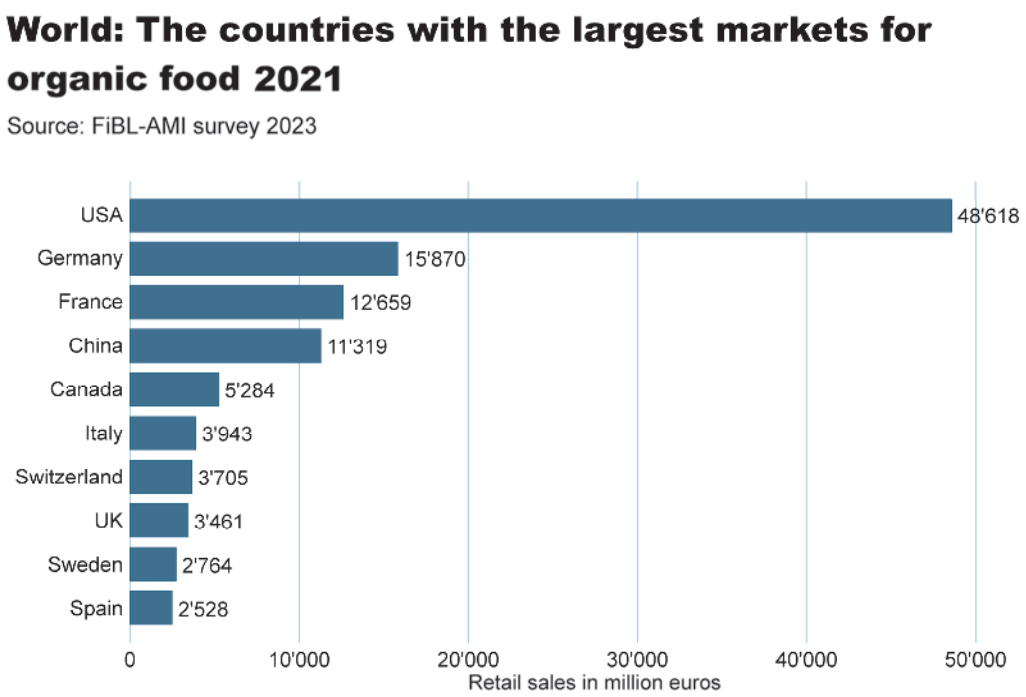


Figure 12: Global market: The countries with the largest markets for organic food 2021

Source: FiBL-AMI survey 2023, based on data from government bodies, the private sector and market research companies. For data sources, see annex, page 338

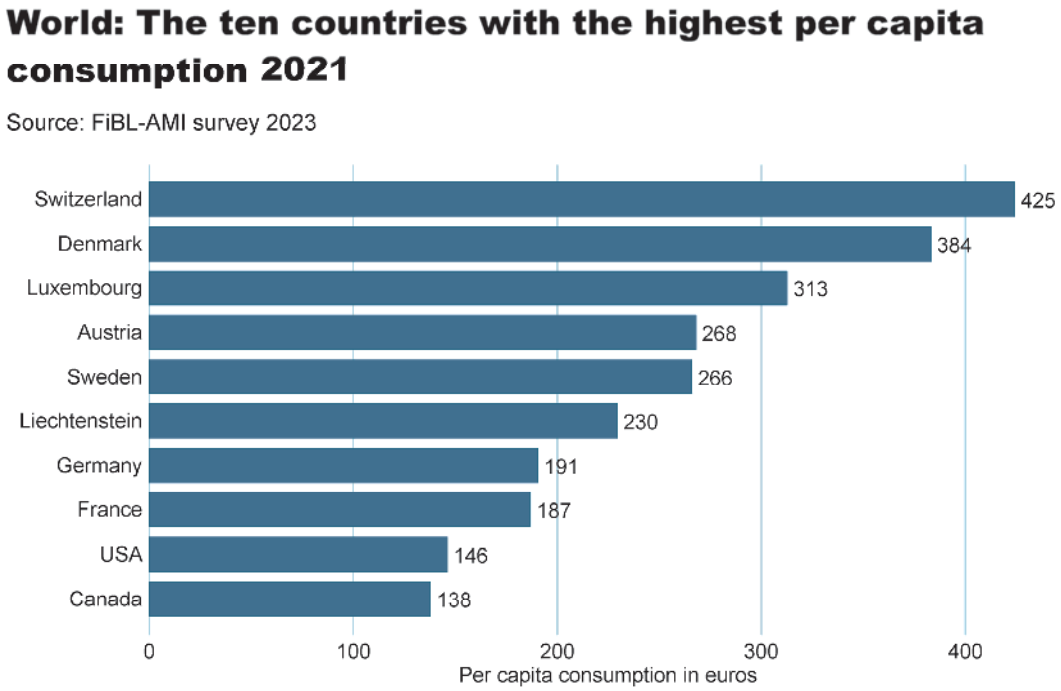


Figure 13: Global market: The ten countries with the highest per capita consumption 2021

Source: FiBL-AMI survey 2023, based on data from government bodies, the private sector and market research companies. For data sources, see annex, page 338

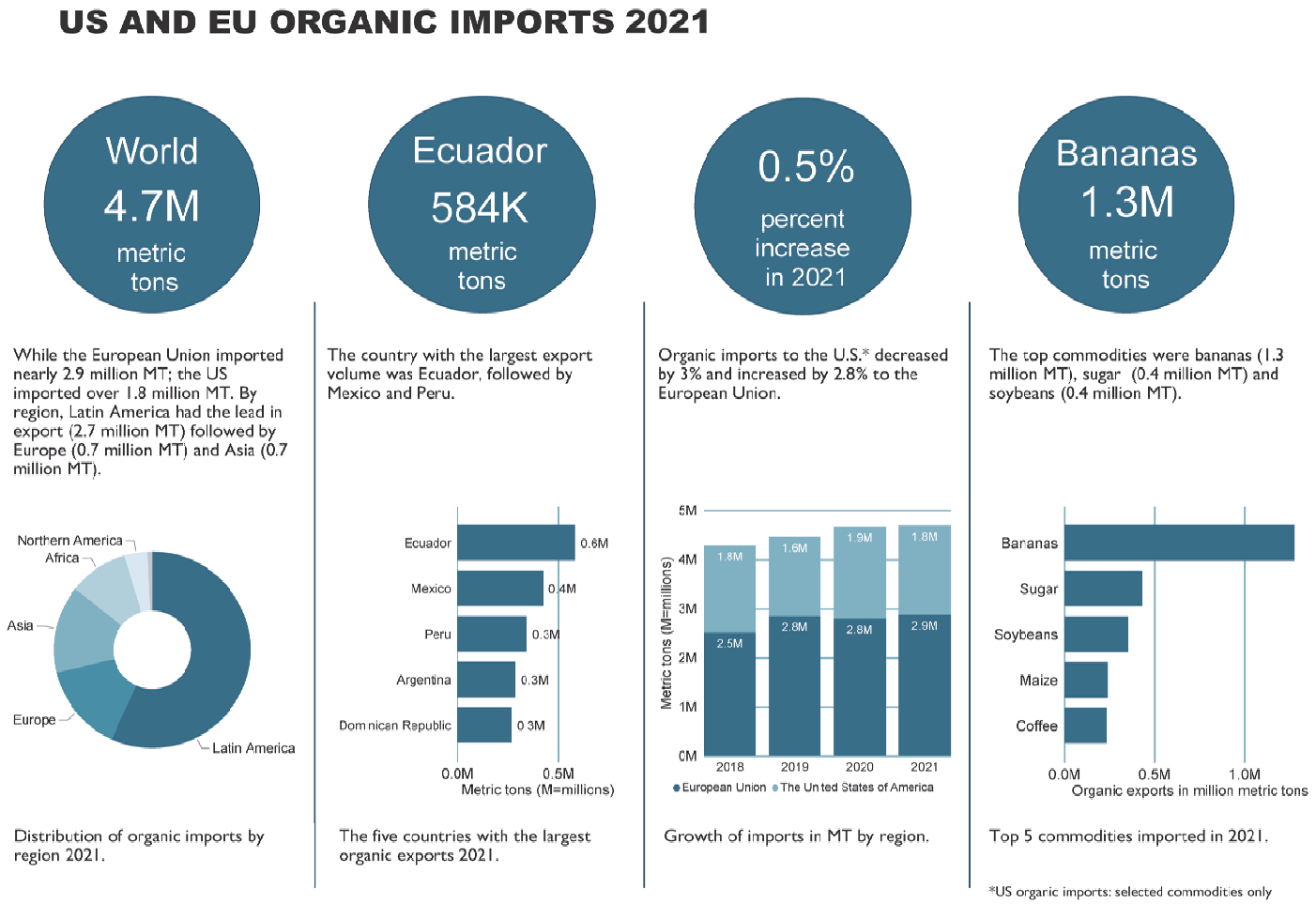
Table 12: Global market data: Retail sales, organic share of all retail sales and per capita consumption by country 2021

It should be noted that retail sales data remains problematic due to differing methods of data collection. Comments and revisions on this table should be sent to helga.willer@fibl.org.

Country	Data year	Retail sales [Million €][1]	Organic share [%]	€/person
Australia	2021	1'694		66
Austria	2021	2'397	11.6	268
Azerbaijan	2011	3		0
Belgium	2021	978	3.8	122
Bhutan	2018	0.03	0.3	0
Bosnia and Herzegovina	2017	0.4		0
Brazil	2016	778		4
Bulgaria	2021	33	1.0	5
Canada	2021	5'284	3.3	138
China	2021	11'319		8
Croatia	2018	99	2.2	24
Czech Republic	2020	226	1.8	22
Denmark	2021	2'240	13.0	384
Estonia	2021	93	5.0	70
Ethiopia	2015	13		0
Finland	2021	407	2.5	74
France	2021	12'659	6.6	187
Germany	2021	15'870	7.0	191
Greece	2021	66	0.3	6
Hungary	2015	30	0.3	3
India	2017	186		0
Ireland	2020	235	2.7	47
Italy	2021	3'943	3.4	67
Japan	2018	1'419		11
	2017		1.4	
Latvia	2017	51	1.5	6
Liechtenstein	2021	9		230
Lithuania	2017	51	1.0	18
Luxembourg	2021	197	11.0	313
Mongolia	2020	1		0
Netherlands	2021	1'374	3.3	79
New Zealand	2020	172		34
	2017		2.2	
Norway	2019	442		83
	2016		1.7	
Poland	2021	314	0.6	8
Portugal	2011	21	0.2	2
Republic of Korea	2021	486		9
Romania	2016	41	0.2	2
Russian Federation	2018	183		1
Saudi Arabia	2021	306		9
Singapore	2017	16		3
Slovenia	2013	49	1.8	27
Spain	2020	2'528	2.5	53
Sweden	2021	2'764	8.9	266
Switzerland	2021	3'705	10.9	425
Thailand	2014	12		0
Türkiye	2014	46		1
Ukraine	2021	28		1
United Kingdom	2021	3'461		52
	2020		1.8	
United States of America	2021	48'618	6.0	146
Total		**124'845**		**15.7**

Source: FiBL-AMI survey 2023, based on data from government bodies, the private sector and market research companies. For data sources, see annex, page 338. Blank cells: No data available

[1] According to the Central European Bank, 1 euro corresponded to 1.1827 US dollars in 2021.



Infographic 5: EU and US organic imports 2021

Source: FiBL survey 2023

Export and import data

International trade data is becoming available for more and more countries. These can be expressed in metric tons or as values. Import data were not available for many countries, but since 2018, the European Union (EU) has collected import data; these are available on page 137. Data on US organic imports (values and quantity) are available on the USDA website.

Please note the US organic import data do not cover all commodities.

Table 13: World: Organic imports to the European Union and US by region 2021

Exporting region	Import destination	2021 exports [MT]	1-year growth [MT]	1-year growth [%]
Africa	Export to EU	428'581	26'032	6.5%
	Export to USA	30'121	-15'843	-34.5%
Africa total		*458'702*	*10'189*	*2.3%*
Asia	Export to EU	609'602	-53'568	-8.1%
	Export to USA	65'111	-34'457	-34.6%
Asia total		*674'712*	*-88'025*	*-11.5%*
Europe	Export to EU	515'187	66'511	14.8%
	Export to USA	163'823	-110'347	-40.2%
Europe total		*679'010*	*-43'836*	*-6.1%*
Latin America	Export to EU	1'256'457	43'396	3.6%
	Export to USA	1'405'827	61'787	4.6%
Latin America total		*2'662'284*	*105'183*	*4.1%*
Northern America	Export to EU	42'508	-6'319	-12.9%
	Export to USA	137'794	40'942	42.3%
Northern America total		*180'302*	*34'623*	*23.8%*
Oceania	Export to EU	20'614	2'794	15.7%
	Export to USA	13'557	2'034	17.7%
Oceania total		*34'171*	*4'828*	*16.5%*
Total exports to EU and US		**4'689'181**	**22'962**	**0.5%**
Total exports to EU		***2'872'948***	***78'845***	***2.8%***
Total exports to US		***1'816'234***	***-55'883***	***-3.0%***

Source. TRACES/European Commission, GATS/USDA, compiled by FiBL

– **Nearly 4.7 million tonnes of organic products were imported into the EU and USA in 2021**
  While the European Union imported 2.9 million MT of organic products, the US imported 1.8 million MT. EU and US organic imports increased by 0.5 percent or almost 23'000 metric tons in 2021.
– **Ecuador was the largest exporter**
  The largest exporters into the EU and US in 2021 were Ecuador (583'589 MT), Mexico (425'414 MT) and Peru (344'483 MT).

- **Large increase in export volume from Mexico, Canada and Colombia**
  Mexico (+59'880 MT, +16.4 percent), Canada (+38'202 MT, +29.3 percent) and Colombia (+27'758 MT, +11.6 percent) increased their exports to the EU and US the most.
- **Significant decline in imports from China, Ukraine and Russia**
  Between 2020/2021, imports of organic products into the EU and US decreased the most from China (-80'272 MT, -35 percent, Russian Federation (-55'297 MT, -47.2 percent) and Ukraine (-34'286 MT, down -12.5 percent).
- **Bananas, sugar and soybeans – the top three most imported products**
  Bananas, sugar and soybeans accounted for 44 percent of total imports of organic commodities in 2021. Bananas were imported at 1'275'723 MT, sugar at 433'962 MT and oilseeds at 353'808 MT.
- **Increase for tropical fruit, decrease for cereals and soybeans**
  The highest increase was recorded for bananas (+67'699 MT, 5.6 percent increase), and also mangoes increased substantially (19'804 MT, 55.1 percent increase). The highest decrease was recorded for wheat (-64'463 MT, - 49.7 percent decrease), maize (-60'947 MT, 20.2 percent decrease) and soybeans (-53'695 MT, 13.2 percent decrease).
- **The US, the Netherlands and Germany are the three main important importers**
  Almost 70 percent of organic commodities are imported through the top three importing countries into the EU and US. The US imported 1.8 million MT (39 percent of all EU/US organic imports), Netherlands 0.9 million MT in 2021 (20 percent), followed by Germany (0.5 million MT, 11 percent). In the case of the Netherlands, a significant part of the imports is further redistributed.

Table 14: World: Organic imports to the European Union and US by country of origin 2021

Please note that this table covers only the Imports into the European Union and the United States. For the United States, it has to be stated that imports are not complete, as not all products are covered.

Country/ Territory	Exports to EU [MT]	Exports to USA [MT]	Exports to EU and USA [MT]
Afghanistan		0	0
Albania	1'970		1'970
Algeria	2'907	13	2'919
Angola	9		9
Argentina	55'259	232'011	287'269
Armenia	121	11	132
Australia	1'714	182	1'896
Austria		415	415
Azerbaijan	1'228		1'228
Bangladesh	180	55	235
Belarus	2'459		2'459
Belize	35		35
Benin	7'708		7'708
Bolivia	12'986	8'138	21'125
Bosnia & Herzegovina	2'762	26	2'788
Botswana	0		0
Brazil	55'452	119'368	174'820
Bulgaria		15	15
Burkina Faso	17'558		17'558
Burundi	73		73
Cambodia	7'661	220	7'880
Cameroon	217	70	288
Canada	30'610	137'794	168'404
Chad	610		610
Chile	27'909	43'355	71'264
China	149'283	3'246	152'529
Colombia	105'199	162'208	267'407
Comoros	42		42
Costa Rica	24'342	9'699	34'042
Côte d'Ivoire	35'481		35'481
Croatia		27	27
Cuba	2'444		2'444
Congo, Dem Rep.	12'550	58	12'608
Denmark		0	0
Djibouti	18		18
Dom. Republic	265'075	3'863	268'937
Ecuador	345'242	238'347	583'589
Egypt	52'020	53	52'073

Country/ Territory	Exports to EU [MT]	Exports to USA [MT]	Exports to EU and USA [MT]
El Salvador	190	127	317
Estonia		5'182	5'182
Ethiopia	17'036		17'036
EU undefined		76	76
Fiji	43		43
France		1'874	1'874
French Polynesia	79		79
Georgia	653	77	730
Germany		245	245
Ghana	23'445	6'953	30'398
Greece		1'846	1'846
Grenada	4		4
Guate-mala	2'675	10'527	13'202
Guinea	38	6	44
Guinea-Bissau	426		426
Guyana	433		433
Haiti	336	1'838	2'174
Honduras	46'261	22'711	68'972
Hong Kong	88	3	91
India	205'928	43'226	249'153
Indonesia	10'802	6'825	17'627
Iran	1'641		1'641
Ireland		16	16
Israel	23'982	663	24'645
Italy		27'450	27'450
Jamaica		6	6
Japan	4'503	637	5'140
Jordan	132	15	147
Kazakh-stan	35'012	98	35'110
Kenya	9'565	184	9'749
Kosovo	522	39	561
Kyrgyz-stan	645		645
Lao	11'692		11'692
Lebanon	10	90	100
Lesotho	793		793
Lithuania		3	3
Mada-gascar	6'947		6'947
Malawi	0	3'566	3'566
Malaysia	42		42
Maldives	455		455
Mali	4'736		4'736
Mauritius	1	295	296
Mexico	73'265	352'149	425'414
Moldova	19'376		19'376
Monteneg ro	17		17
Morocco	20'077	1'169	21'246
Mozambi que	5'311		5'311
Myanmar	90	5	95
Namibia	14		14
Nepal	230	10	240
Netherlan ds		669	669
New Caledonia	0		0
New Zealand	17'317	12'269	29'587
Nicaragua	6'869	5'716	12'584
Niger	700		700
Nigeria	831	75	906

Country/ Territory	Exports to EU [MT]	Exports to USA [MT]	Exports to EU and USA [MT]
North Mace-donia	654	8	662
Pakistan	45'244	381	45'625
Palestine	861		861
Panama	474	796	1'270
Papua New Guinea	1'388	1'106	2'494
Paraguay	26'931	51'859	78'790
Peru	203'577	140'906	344'483
Philippine s	26'136		26'136
Poland		2	2
Portugal		3'228	3'228
Republic of Korea	300	30	331
Romania		9	9
Russian Fede-ration	15'919	45'946	61'865
Rwanda	663	67	730
Samoa	51		51
Sao Tome & Principe	4'888		4'888
Saudi Arabia	277		277
Senegal	2'891		2'891
Serbia	19'373	95	19'468
Seychelles	24		24
Sierra Leone	16'236		16'236
Singapore	877		877
Somalia	59		59
South Africa	28'139	312	28'450
Spain		10'082	10'082
Sri Lanka	44'528	194	44'723
Sudan	4'997		4'997
Suriname	88		88
Sweden		45	45
Switzer-land	7	25	32
Syria		6	6
Taiwan	93	25	118
Tanzania	4'744	45	4'788
Thailand	20'077	7'981	28'058
Timor-Leste		724	724
Togo	68'341	4'390	72'731
Tunisia	55'717	12'362	68'079
Türkiye	154'938	15'817	170'755
Uganda	22'452	414	22'866
Ukraine	189'239	50'329	239'568
United Arab Emirates	303	17	319
UK	107'951	356	108'307
USA	11'898		11'898
Uruguay	1'409	2'203	3'612
Uzbekista n	1'257		1'257
Vanuatu	21		21
Viet Nam	15'267	565	15'832
Yemen		8	8
Zambia	1	92	93
Zim-babwe	314		314
Total	**2'872'948**	**1'816'234**	**4'689'181**

Source: TRACES/European Union and GATS/USDA

Organic farming in developing countries and emerging markets

The Development Assistance Committee (DAC) of the Organisation for Economic Co-operation and Development (OECD) is a forum to discuss issues surrounding aid, development and poverty reduction in developing countries. The recipients of Official Development Assistance (ODA) according to the DAC list[1] are studied in this section.

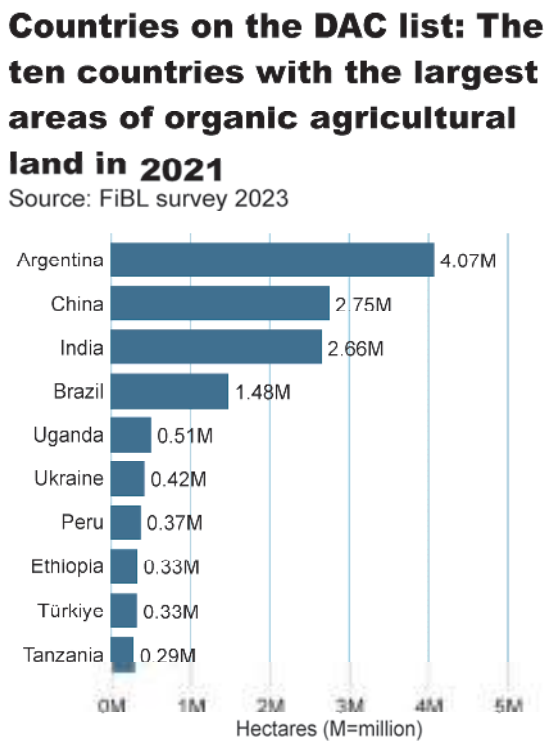
- More than 3.2 million organic producers from the countries on this list were counted (88 percent of all organic producers).
- More than a fifth of the world's organic agricultural land, 17.0 million hectares, is located in countries on this list.
- Almost half of the agricultural land of the countries on the DAC list is located in Latin American countries (6.9 million hectares), with Asia (6.4 million) and Africa (2.6 million) in second and third place.
- The countries with the largest areas of organic agricultural land are Argentina, China and India, in that order. Not surprisingly, all of them are large countries (Figure 14).
- However, when it comes to organic agricultural land as a percentage of the total area under cultivation, the order is different. The countries on the DAC list with the highest percentages of organic agricultural land are Samoa (29.1 percent), São Tomé and Príncipe (21.1 percent) and Dominica (11.6 percent). Argentina, with by far the largest area under organic cultivation (with 4.0 million hectares), is ranked 16 (2.7 percent) when the organic agricultural area is expressed as a share of the total agricultural area. The organic area shares of the total agricultural land of the top ten countries on the DAC list are comparable to that of many European countries, and the high organic shares can be attributed in part to a high production potential for, and focus on, exports. Support activities may also play a role. However, of the countries on the DAC list (104 in total), only 30 percent have an organic share higher than one percent of the total agricultural area (Figure 15).
- Land use details were available for more than 78 percent of the agricultural land of the countries on the DAC list; crop data is missing for some of the world's largest producing countries (India and Brazil). Available statistics show that organic arable land areas constituted over 30 percent of the organic agricultural land, organic grassland/grazing over 23 percent, and organic permanent crops more 22 percent. Exports play an important role, either for meat products (mainly from Argentina and Uruguay) or for unprocessed permanent and arable crops. The most important crops are cereals, coffee, oilseeds, textile crops (mainly cotton), nuts, coconuts, olives, cocoa, etc. For Africa, coffee and olives, for Asia, cereals and oilseeds, and for Latin America, coffee and cocoa are the most important crops.

[1] The country list of the Development Assistance Committee DAC is available on the OECD website at http://www.oecd.org/dac/stats/daclist.htm

Table 15: Countries on the DAC list[1]: Development of organic agricultural land 2012-2021

	2012		2016		2021	
Region	**Organic area [ha]**	**[%]**	**Organic area [ha]**	**[%]**	**Organic area [ha]**	**[%]**
Africa	1'145'186	0.1	1'613'089	0.1	2'661'766	0.2
Asia	3'146'877	0.1	4'809'139	0.2	6'401'429	0.4
Europe	841'733	0.5	957'978	0.6	819'556	1.1
Latin America	5'589'776	0.4	5'667'297	0.4	6'938'366	1.0
Oceania	53'350	1.3	113'154	2.6	216'255	10.3
Total	**10'776'921**	**0.2**	**13'160'657**	**0.2**	**17'037'372**	**0.5**

Source: FiBL surveys, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338



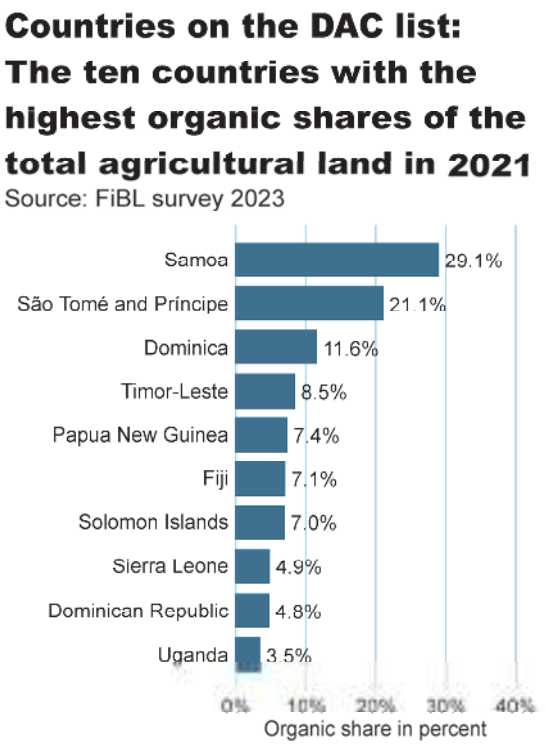


Figure 14 (left): Countries on the DAC list: The ten countries with the largest areas of organic agricultural land in 2021

Figure 15 (right): Countries on the DAC list: The ten countries with the highest organic shares of the total agricultural land in 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

[1] The development is displayed for all countries, which are on the 2021 DAC list. The data is not comparable to those previously published, as there were changes in the list.

Land use and key commodities in organic agriculture

Land use

General land use information was available for 93 percent of the organic agricultural land; however, this does not mean detailed crop information is available for all areas as not all countries (e.g. Brazil and India) provided detailed crop data.[1, 2]

About two-thirds of the 76.4 million hectares of organic agricultural land in 2021 were grassland/grazing areas (over 49.5 million hectares). The cropland area (arable land with 14.7 million hectares and permanent crops with 6.2 million hectares) constituted 20.9 million hectares, which was less than a quarter of the organic agricultural land (Table 16).

The land use information by geographical region is summarized in Figure 16 and Table 16. While in Oceania and Latin America, permanent grassland/grazing covers a large part of the organic farmland area, in Africa, permanent crops are the most important land use type. In Asia, Europe and North America, arable land is the most important.

Table 16: World: Land use in organic agriculture by 2021

Land use	Africa [ha]	Asia [ha]	Europe [ha]	Latin America [ha]	Northern America [ha]	Oceania [ha]	World [ha]
Arable land crops	811'988	3'390'547	8'447'077	527'258	1'522'101	51'386	14'750'358
Permanent crops	1'747'781	928'199	1'997'091	934'934	458'009	147'284	6'213'298
Perm. grassland	52'197	8'468	6'945'344	6'895'152	964'953	34'672'149	49'538'263
Total	2'663'980	6'504'210	17'844'856	9'870'888	3'542'140	35'985'809	76'403'776

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338. Total includes areas for which no further details were available.

The key arable crops were cereals, green fodder from arable land and oilseeds. For permanent crops, olives, nuts and coffee were the most relevant (Figure 17, Table 17, Table 18). For details, see section on arable and permanent crops on the following pages.

While the arable and permanent crop area increased by 11.5 and 15.4 percent, respectively, organic grassland/grazing areas decreased by 2.5 percent (Figure 18).

[1] For some countries, only information on the main uses (arable crops, permanent crops, and permanent grassland) was available. For other countries, very detailed statistical land use information can be found.
[2] The FAO classification of land use was utilized for this survey with slight modifications. A system similar to that of Eurostat was used for the classification of crops. The following main levels were used to classify the land use data: arable land, permanent crops, cropland for which no further details were available (cropland = arable land + permanent cropland), permanent grassland/grazing areas, other agricultural areas (such as hedges) and agricultural land for which no details were available at all. For crop groups by land use type, see Table 17 and Table 18. Aquaculture, forest, and grazed non-agricultural land were distinguished from "agricultural land" with a separate category, as were organic wild collection areas and beekeeping areas. For more details, see the FAOSTAT homepage, faostat.fao.org: Home > Concepts and Definitions > Glossary, or http://faostat.fao.org/site/379/DesktopDefault.aspx?PageID=379

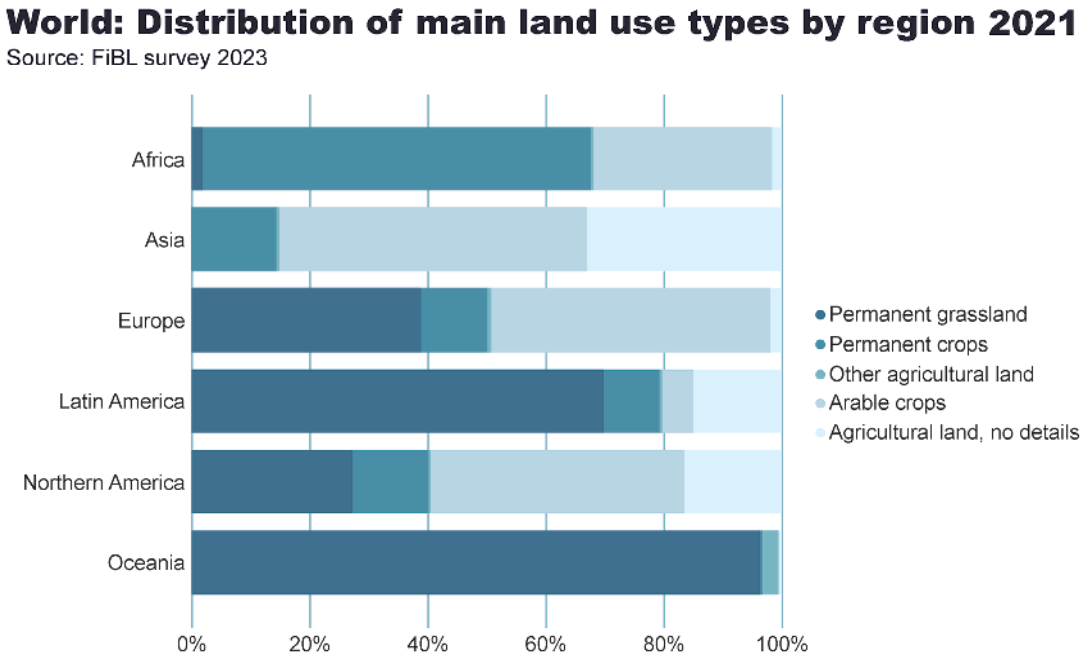


Figure 16: World: Distribution of main land use types by region 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

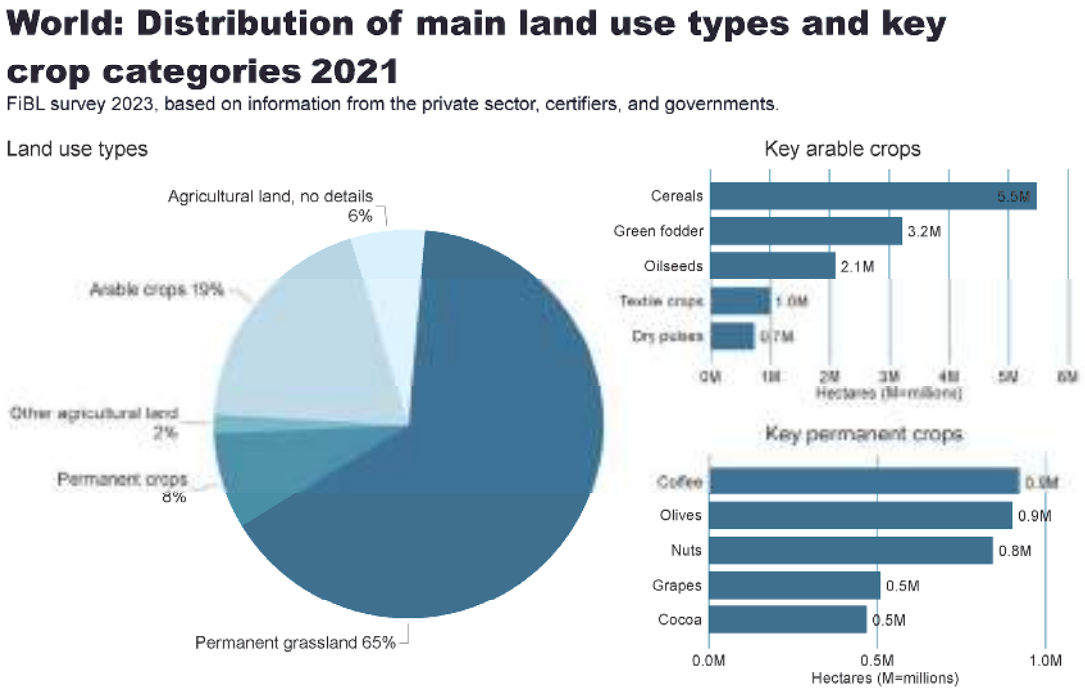


Figure 17: World: Distribution of main land use types and key crop categories 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

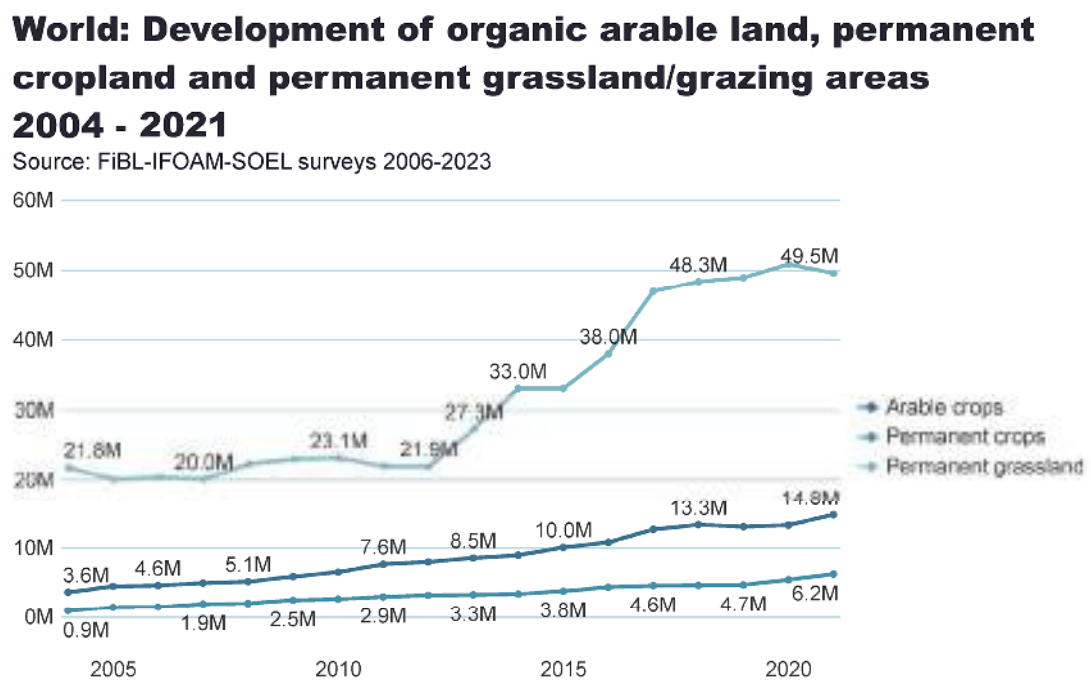


Figure 18: World: Development of organic farmland by landuse 2004-2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Arable land

With a total of more than 14.8 million hectares, organic arable land constituted 19 percent of the world's organic agricultural land and 1 percent of the world's arable cropland.

Compared to 2020, organic arable land increased by 11.5 percent.

Almost 58 percent of the arable land was located in Europe, followed by Asia (23 percent) and Northern America (10 percent) (Figure 19). Most of the arable cropland was used for cereals, including rice (5.5 million hectares), green fodder (3.2 million hectares) and oilseeds (2.1 million hectares) (Figure 20 and Table 17).

Permanent crops

Permanent crops accounted for more than 6.2 million hectares, which is 3.5 percent of the world's permanent cropland. Compared with 2020, an increase of more than 0.8 million hectares, or 15.4 percent, was reported.

Eight percent of the organic agricultural land was permanent cropland.

Most of the permanent cropland was in Europe (almost 2.0 million hectares), followed by Africa (nearly 1.7 million hectares) and Asia (over 0.9 million hectares) (Figure 21; Figure 22 and Table 18).

Table 17: Use of organic arable land 2012, 2020 and 2021 compared

Crop group	Organic area 2021 [ha]	Share of total 2021 [%]	1 year change [ha]	1 year change [%]	10 year change [ha]	10 year change [%]
Cereals	5'480'988	0.7	386'928	7.6	2'626'285	92.0
Dry pulses	733'308	0.8	-6'087	-0.8	408'856	126.0
Oilseeds	2'098'555	0.8	301'709	16.8	1'416'643	207.7
Plants harvested green	3'218'742	7.3	-17'694	-0.5	911'981	39.5
Root crops	157'451	0.2	16'177	11.5	102'482	186.4
Sugarcane	107'790	0.4	11'686	12.2	69'476	181.3
Textile crops	986'745	2.8	366'374	59.1	899'673	1'033.2
Vegetables	445'884	0.7	-446.2	-0.1	207'283	86.9
Total	14'750'358	0.8%	1'520'266	11.5	6'770'902	84.9

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. Total includes unspecified arable land. For detailed data sources, see annex, page 338

Table 18: Use of organic permanent cropland 2012, 2020 and 2021 compared

Crop group	Organic area 2021 [ha]	Share of total 2021 [%]	1 year change [ha]	1 year change [%]	10 year change [ha]	10 year change [%]
Berries	101'759	16.9	38'670	61.3	59'161	138.9
Citrus fruit	114'600	1.1	-20'162	-15.0	58'096	102.8
Cocoa	469'659	4.0	-8'946	-1.9	267'857	132.7
Coconut	309'618	2.7	18'520	6.4	251'496	432.7
Coffee	922'399	8.1	195'837	27.0	252'308	37.7
Fruit of temperate climate zones	301'829	2.6	26'373	9.6	137'278	83.4
Fruit, tropical and subtropical	330'019	1.1	62'908	23.6	109'395	49.6
Grapes	510'033	7.5	3'594	0.7	222'005	77.1
Medicinal/aromatic plants	123'712	5.5	10'561	9.3	83'484.8	207.5
Nuts	843'862	5.4	135'082	19.1	581'301	221.4
Olives	902'601	8.6	3'816	0.4	327'035	56.8
Tea/mate, etc.	209'639	3.8	36'414	21.0	138'650	195.3
Total	6'213'298	3.5%	828'749	15.4	3'021'763	94.7

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. Total includes unspecified permanent cropland. For detailed data sources, see annex, page 338

Table 19: Use of organic arable and permanent cropland 2012, 2020 and 2021 compared

Crop group	Organic area 2021 [ha]	Share of total 2021 [%]	1 year change [ha]	1 year change [%]	10 year change [ha]	10 year change [%]
Arable & permanent crops	20'963'656	1.1%	2'349'015	12.6	9'792'664	87.7

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

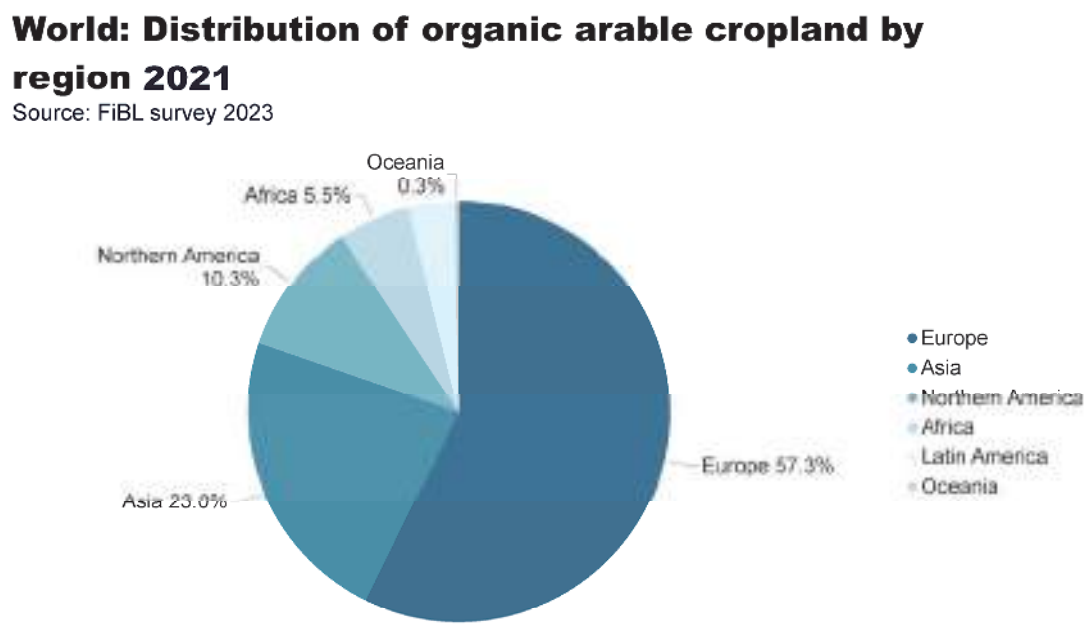


Figure 19: World: Distribution of organic arable cropland by region 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

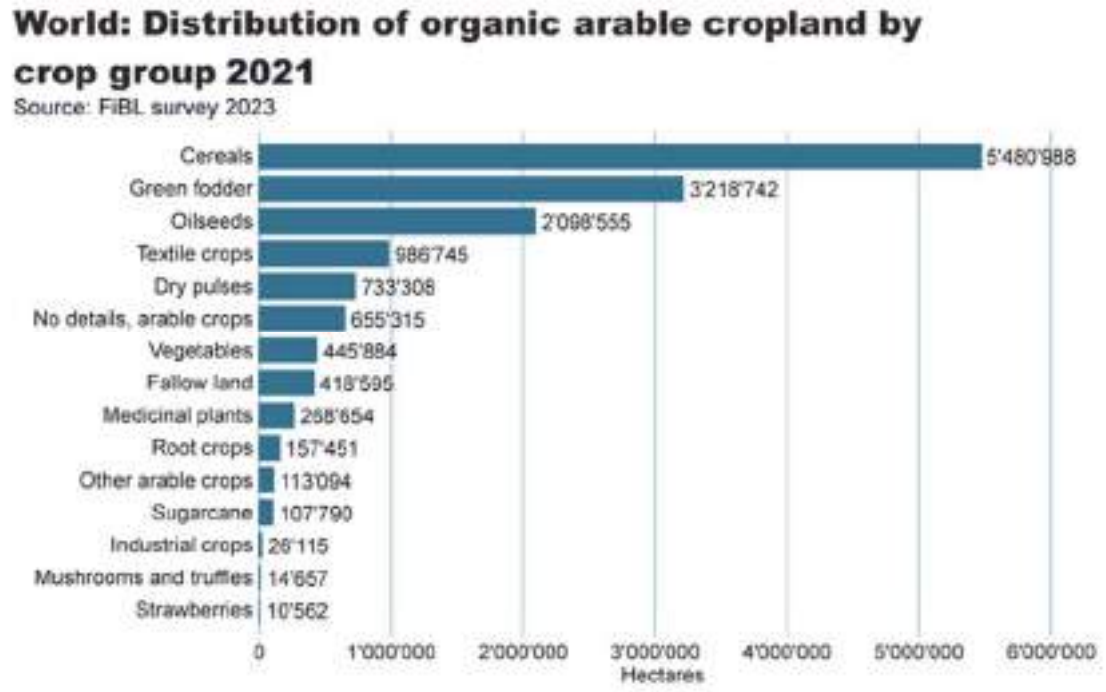


Figure 20: World: Use of arable cropland by crop group 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

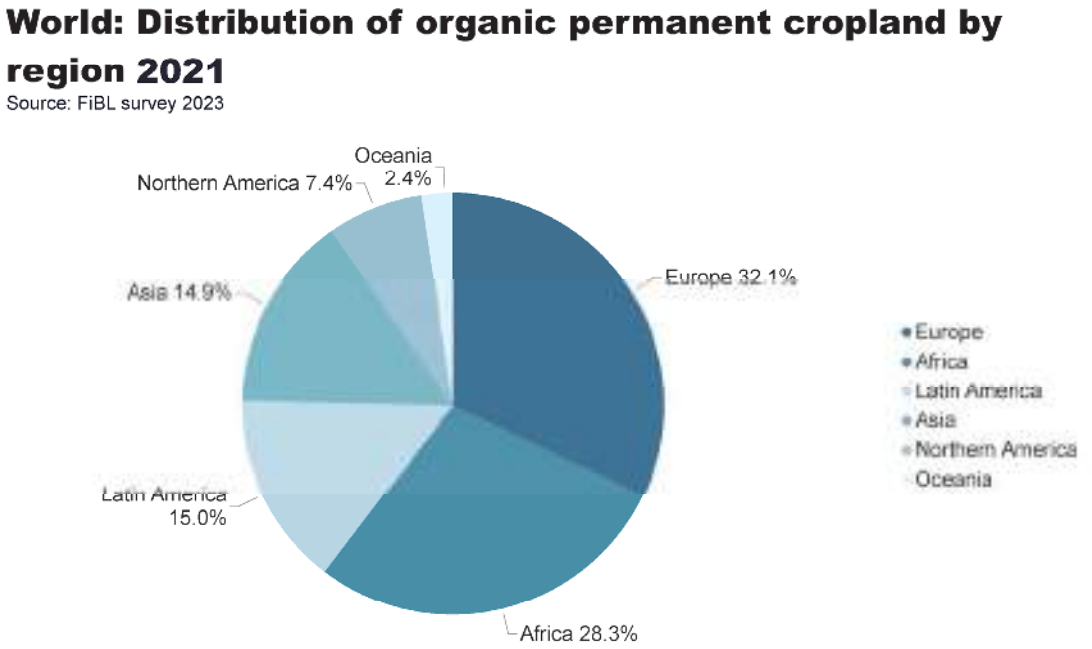


Figure 21: World: Distribution of permanent cropland by region 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

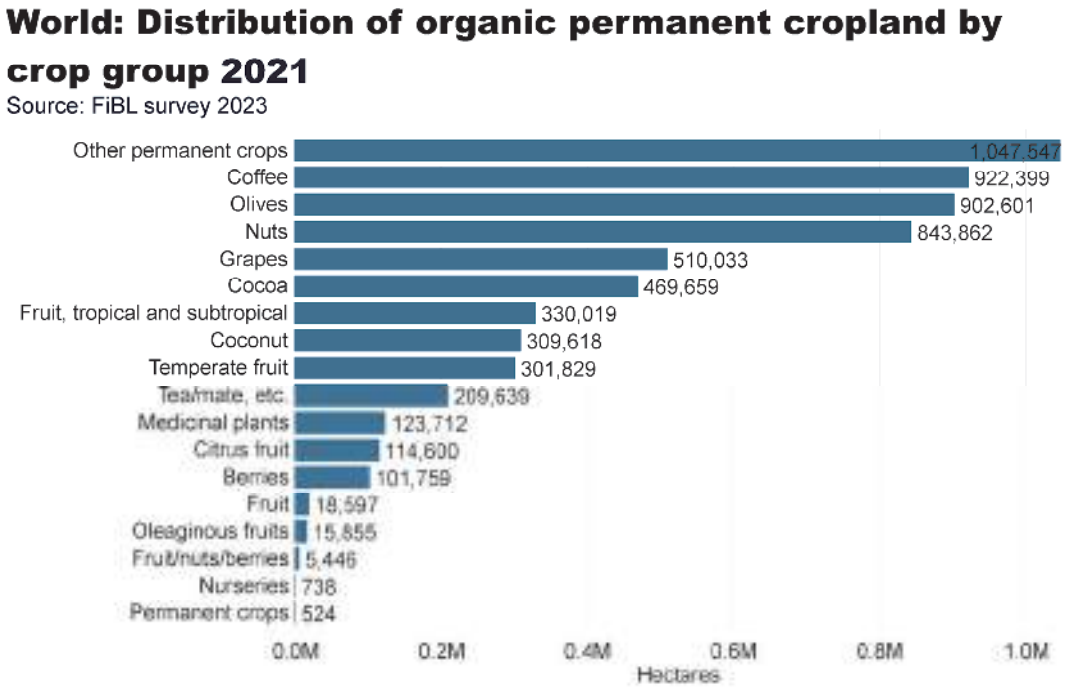


Figure 22: World: Use of permanent cropland by crop group 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Wild collection and beekeeping areas

The collection of wild-harvested crops is defined in the IFOAM Norms (IFOAM 2014), and wild collection activities are regulated by organic laws. A collection area (including beekeeping) of 29.7 million hectares was reported in 2021. The organic wild collection areas are concentrated in Africa, Europe, Asia and Latin America (Figure 23 and Table 20); the distribution is thus quite different from that of the organic agricultural land.

The countries with the largest areas are Finland (mainly berries), followed by Zambia, Namibia (Figure 24). Medicinal and aromatic plants play the most important role (Table 21). Unfortunately, for most of the wild collection areas, no details were available.

Table 20: Wild collection and beekeeping areas by region 2020 and 2021 compared

Region	2020 [ha]	2021 [ha]	Change 2020-2021 [ha]	Change 2020-2021 [%]
Africa	11'772'231	12'756'436	984'204.8	8.4%
Asia	3'522'309	3'815'281	292'972.0	8.3%
Europe	8'689'564	10'585'464	1'895'899.8	21.8%
Latin America	3'075'474	2'377'015	-698'459.0	-22.7%
Northern America	289'965	8'406	-281'558.8	-97.1%
Oceania		121'794	121'794.3	
World	**27'349'543**	**29'664'396**	**2'314'853.1**	**8.5%**

Source: FiBL survey 2023, based on data from governments, the private sector, and certifiers.
For detailed data sources, see annex, page 338

Table 21: Wild collection and beekeeping areas by crop group 2020 and 2021

Land use/Product	Area [ha] 2020	Area [ha] 2021
Bee pastures	2'540'848	2'514'809
Berries, wild collection	283'459	258'821
Coffee, wild collection		6'442
Forest products	2'077	2'009
Fruit, wild collection	725'562	2'004'982
Marula, wild collection	90'225	10'000
Medicinal and aromatic plants, wild collection	3'886'743	3'204'305
Mushrooms, wild collection	0	
Nuts, wild collection	1'154'518	1'719'565
Oil plants, wild collection	33'197	35'877
Palmito, wild collection	56'649	56'699
Permanent crops, wild collection, other	20'240	15'138
Rose hips, wild collection	1'421'703	2'425'519
Seaweed	200'015	211'328
Wild collection, no details/other	16'934'307	17'198'903
Total	**27'349'543**	**29'664'396**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. The total includes areas for which no details were available. *For detailed data sources, see annex, page 338*

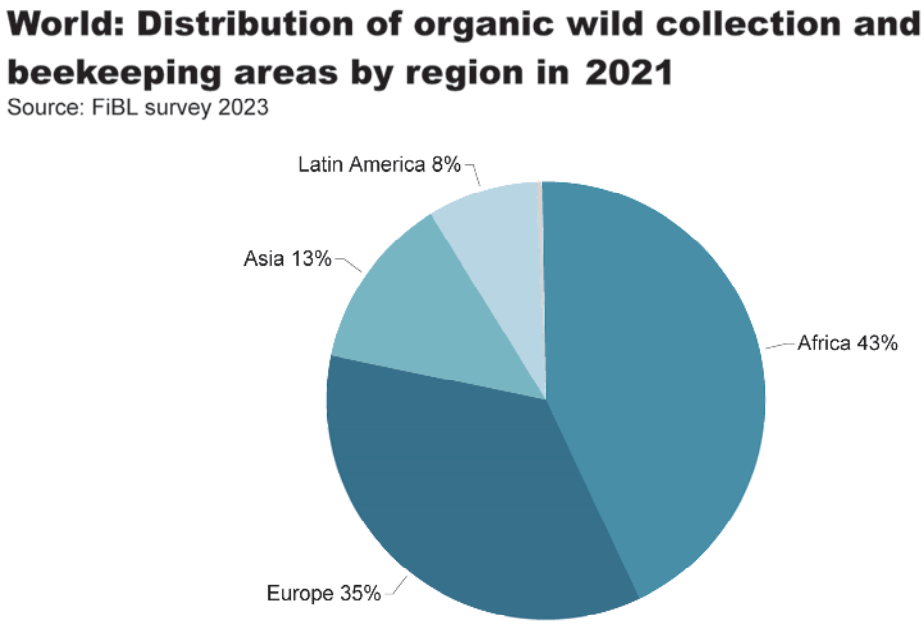


Figure 23: World: Distribution of organic wild collection and beekeeping areas by region in 2021

Source: FiBL survey 2023, based on data from government bodies, the private sector and certifiers. For detailed data sources, see annex, page 338

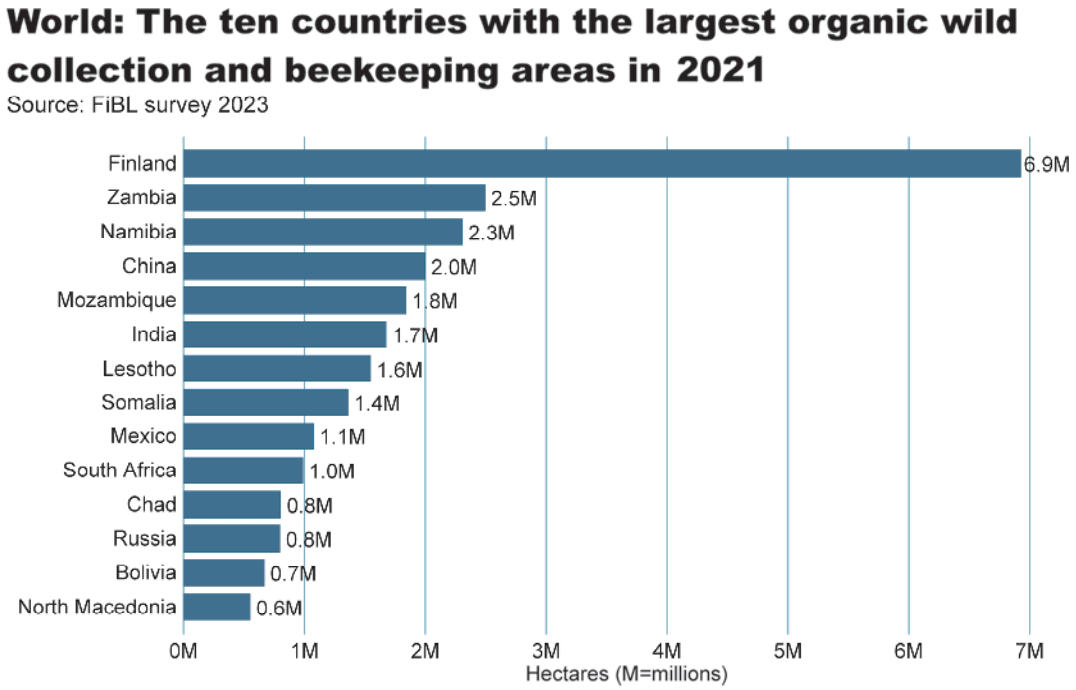


Figure 24: World: The ten countries with the largest organic wild collection and beekeeping areas in 2021

Source: FiBL survey 2023, based on data from government bodies, the private sector, and certifiers. For detailed data sources, see annex, page 338

Table 22: Wild collection and beekeeping areas by country 2021

Country	Land use	Area [ha]
Albania	Wild collection, no details	475'136
Argentina	Wild collection, no details	20'559
Armenia	Wild collection, no details	3'852
Azerbaijan	Wild collection, no details	2'126
Bhutan	Wild collection, no details	2'223
Bolivia (Plurinational State of)	Nuts, wild collection	672'328
Bosnia and Herzegovina	Wild collection, no details	195'668
Botswana	Fruit, wild collection	6'380
Brazil	Wild collection, no details	3
	Nuts, wild collection	13'358
	Fruit, wild collection	400
Burkina Faso	Seaweed	0
	Nuts, wild collection	87'760
Cambodia	Medicinal and aromatic plants, wild collection	8
Cameroon	Nuts, wild collection	4'600
Canada	Wild collection, no details	7'810
Chad	Wild collection, other	231'130
	Nuts, wild collection	577'676
Chile	Wild collection, no details	105'127
China	Wild collection, no details	2'004'000
Colombia	Wild collection, no details	28'000
	Fruit, wild collection	2'500
	Palmito, wild collection	3'250
Dominican Republic	Wild collection, no details	3'081
Ecuador	Wild collection, no details	942
Estonia	Wild collection, no details	445'512
Ethiopia	Bee pastures	720
	Coffee, wild collection	6'442
Finland	Wild collection, no details	6'928'693
French Guiana (France)	Wild collection, no details	44
	Medicinal and aromatic plants, wild collection	25
French Polynesia	Wild collection, no details	115'930
Ghana	Wild collection, no details	147
	Nuts, wild collection	142'085
Grenada	Medicinal and aromatic plants, wild collection	0
Guadeloupe (France)	Forest products	7
Guatemala	Apiculture	9'677
	Wild collection, no details	119'647
	Medicinal and aromatic plants, wild collection	39'766
Guyana	Forest products	2'000
	Palmito, wild collection	53'449
Iceland	Seaweed	211'328
	Wild collection, no details	243'054
India	Wild collection, no details	1'681'296
Indonesia	Wild collection, no details	230
	Medicinal and aromatic plants, wild collection	1
Iran (Islamic Republic of)	Rose hips, wild collection	4
Israel	Berries, wild collection	3
Jamaica	Wild collection, no details	7
Kenya	Apiculture	753
	Wild collection, no details	177'384
	Wild collection, other	54'254
	Oil plants, wild collection	1'514
	Medicinal and aromatic plants, wild collection	121'625
Kosovo	Wild collection, no details	373'488
Lebanon	Nuts, wild collection	258
Lesotho	Rose hips, wild collection	1'551'891
Madagascar	Wild collection, no details	3'235
Mali	Wild collection, no details	6'700
	Wild collection, other	8'000
	Nuts, wild collection	95
Mexico	Wild collection, no details	1'077'344
	Nuts, wild collection	474

Country	Land use	Area [ha]
	Medicinal and aromatic plants, wild collection	2'149
Moldova	Nuts, wild collection	1'351
Morocco	Wild collection, no details	297'177
	Wild collection, other	1'820
	Fruit, wild collection	4'367
	Oil plants, wild collection	31'692
	Medicinal and aromatic plants, wild collection	250
Mozambique	Wild collection, other	31'400
	Fruit, wild collection	1'810'885
Namibia	Wild collection, no details	69'510
	Oil plants, wild collection	471
	Medicinal and aromatic plants, wild collection	2'244'008
Nepal	Wild collection, no details	24'344
	Medicinal and aromatic plants, wild collection	50
Nicaragua	Apiculture	3'494
North Macedonia	Medicinal and aromatic plants, wild collection	556'600
Oman	Oil plants, wild collection	2'200
Peru	Nuts, wild collection	219'384
Philippines	Medicinal and aromatic plants, wild collection	0
Réunion (France)	Forest products	2
	Berries, wild collection	0
Russian Federation	Wild collection, no details	791'583
	Nuts, wild collection	121
	Berries, wild collection	10'000
Samoa	Wild collection, no details	5'864
Senegal	Wild collection, no details	25
	Wild collection, other	95
	Nuts, wild collection	
	Permanent crops, wild collection, other	15'138
Seychelles	Wild collection, no details	1'223
Somalia	Wild collection, no details	155'767
	Wild collection, other	1'208'930
South Africa	Wild collection, no details	9'088
	Nuts, wild collection	10
	Medicinal and aromatic plants, wild collection	121'419
	Rose hips, wild collection	861'045
Sudan	Wild collection, other	98'044
Tanzania	Bee pastures	165
	Wild collection, other	2'597
Thailand	Wild collection, no details	90'742
Togo	Wild collection, no details	
Türkiye	Wild collection, no details	24'334
Uganda	Nuts, wild collection	65
	Medicinal and aromatic plants, wild collection	1
Ukraine	Wild collection, no details	67'795
	Berries, wild collection	248'222
	Rose hips, wild collection	12'579
United Arab Emirates	Medicinal and aromatic plants, wild collection	2
United States of America	Berries, wild collection	596
Viet Nam	Wild collection, no details	3'643
	Wild collection, other	300
Zambia	Bee pastures	2'500'000
Zimbabwe	Fruit, wild collection	180'450
	Medicinal and aromatic plants, wild collection	118'400
	Marula, wild collection	10'000
Total		**29'664'396**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Beehives

There were almost 2.73 million organic beehives in 2021, representing 3.0 percent of the world's beehives.[1] Organic beehives are concentrated in Europe (39.1 percent) and Latin America (37.8 percent) (Figure 25). The country with the largest number of organic beehives was Brazil (approximately 630'000), followed by Zambia (almost 370'000) and Mexico (more than 260'000) (Figure 25). The total number has increased five-fold since 2007, when over 535'000 beehives were reported.

One of the main challenges for new organic beekeepers is the conversion process due to the lack of access to knowledge on organic beekeeping practices and the organic certification process. Furthermore, the production of good quality organic honey and the control of the Varroa parasite with organic methods are major obstacles for organic beekeepers.

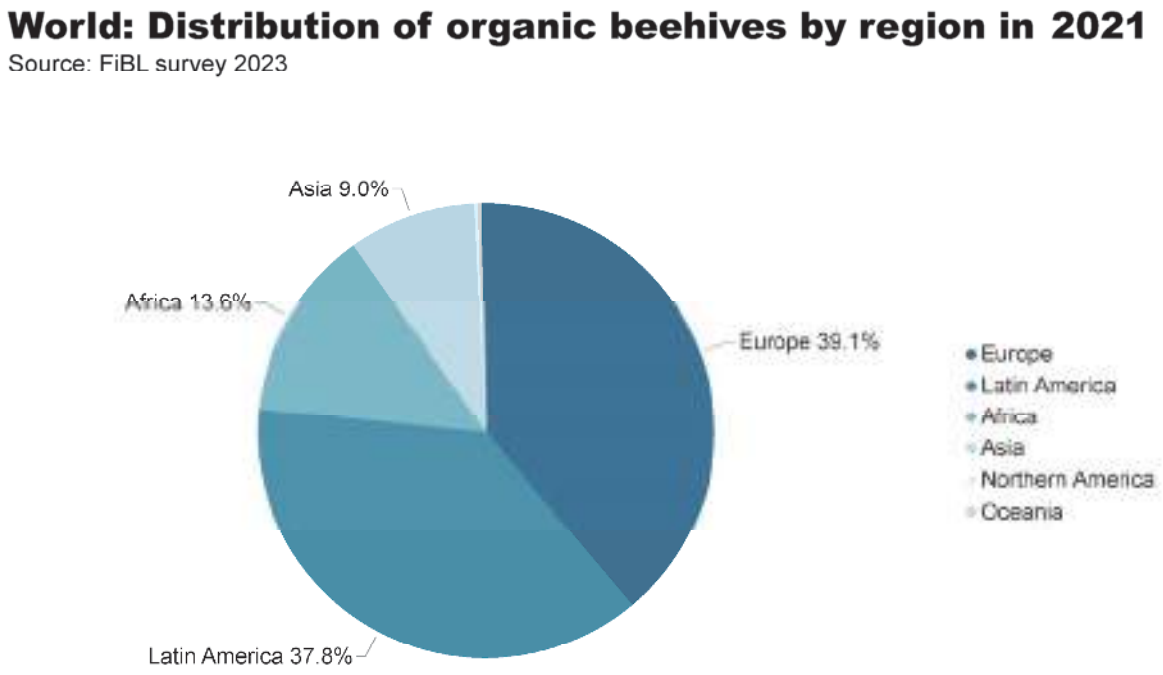


Figure 25: World: Distribution of organic beehives by region in 2021

Source: FiBL survey 2023, based on data from government bodies, the private sector, and certifiers. For detailed data sources, see annex, page 338

Table 23: Number of organic beehives by country 2021

Country/Territory	Area [ha]
Argentina	31'540
Armenia	1'501
Australia	6'475

Country/Territory	Area [ha]
Austria	22'192
Belarus	3'200
Belgium	30

[1] According to FAO, there were 90'548'801 beehives in 2020. The FAOSTAT website > Production > Live animals at http://www.fao.org/faostat/en/#data/QA

Country/Territory	Area [ha]
Bhutan	177
Bosnia and Herzegovina	120
Brazil	629'939
Bulgaria	232'072
Canada	6'639
Chile	23'508
China	229'084
Croatia	2'367
Cyprus	184
Czech Republic	451
Denmark	177
Dominican Republic	9'804
Estonia	2'899
Finland	11'010
France	122'647
French Guiana (France)	211
Georgia	1'721
Germany	35'000
Guadeloupe (France)	302
Guatemala	27'415
Iran (Islamic Republic of)	4'640
Iraq	1'900
Italy	171'094
Kosovo	40
Latvia	23'541
Lebanon	820
Liechtenstein	
Lithuania	1'092

Country/Territory	Area [ha]
Martinique (France)	37
Mayotte	12
Mexico	262'787
Moldova	7'200
Montenegro	3'381
Morocco	1'242
Nicaragua	20'985
North Macedonia	9'829
Norway	1'861
Portugal	48'604
Réunion (France)	1'338
Romania	170'789
Russian Federation	94
Saudi Arabia	6'500
Serbia	12'618
Slovakia	251
Slovenia	1'814
Spain	81'650
Sweden	2'182
Switzerland	5'202
Tunisia	579
Türkiye	94'736
Ukraine	300
Uruguay	24'297
Zambia	368'274
Total	**2'730'354**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Aquaculture

Naturland from Germany was the first organisation to certify organic aquaculture products, starting in 1995 with the certification of carp in Germany. Organic was the first Voluntary Sustainability Standard (VSS) to cover aquaculture production (Potts et al., 2016). In 2005, IFOAM – Organics International approved the final version of its aquaculture standard.

A production volume of more than 600'000 metric tons of organic aquaculture was reported in 2021.

- According to the available data, aquaculture production is concentrated in Asia (82 percent, mainly China) and Europe (18 percent).
- The largest production volume was found in China (562'800 metric tons; however, without breakdown by species), followed by Norway (26'999 metric tons) (Table 25 and Figure 26).

Unfortunately, some countries with large aquaculture production, such as Brazil and Indonesia, did not provide data on organic aquaculture; so it can be assumed that the organic aquaculture production volume is higher.

A breakdown by species was available for one-fourth of the total production. According to the available data, organic salmon is the most produced species (56'224 metric tons), followed by mussels (44'342 metric tons) and shrimps (11'646 metric tons) (Table 24).

Table 24: Organic aquaculture: Production volume by species 2021

Main species	Production [MT]
Aquaculture, no details	568'003
Aquatic plants	937
Carps	2'686
Char	
Clams, cockles, arkshells	1'320
Freshwater fishes	43
Miscellaneous coastal fishes	250
Mussels	44'343
Oysters	3'202
Salmons, trouts, smelts	56'224
Sea bass	127
Seabream	223
Shellfish	3
Shrimps, prawns	11'646
Sturgeons, paddlefishes	281
Total	**689'287**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

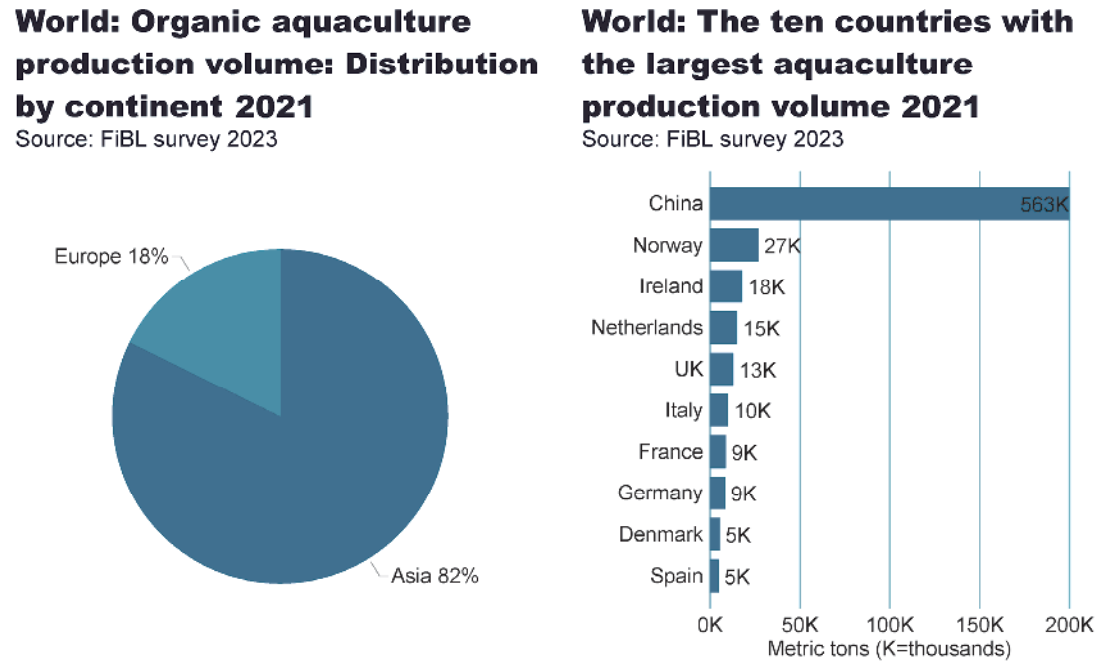


Figure 26: World: Organic aquaculture production volume: Distribution by continent and top 10 countries 2021

Source: FiBL-survey 2023; based on national data sources and certifier data. For detailed data sources, see annex, page 338

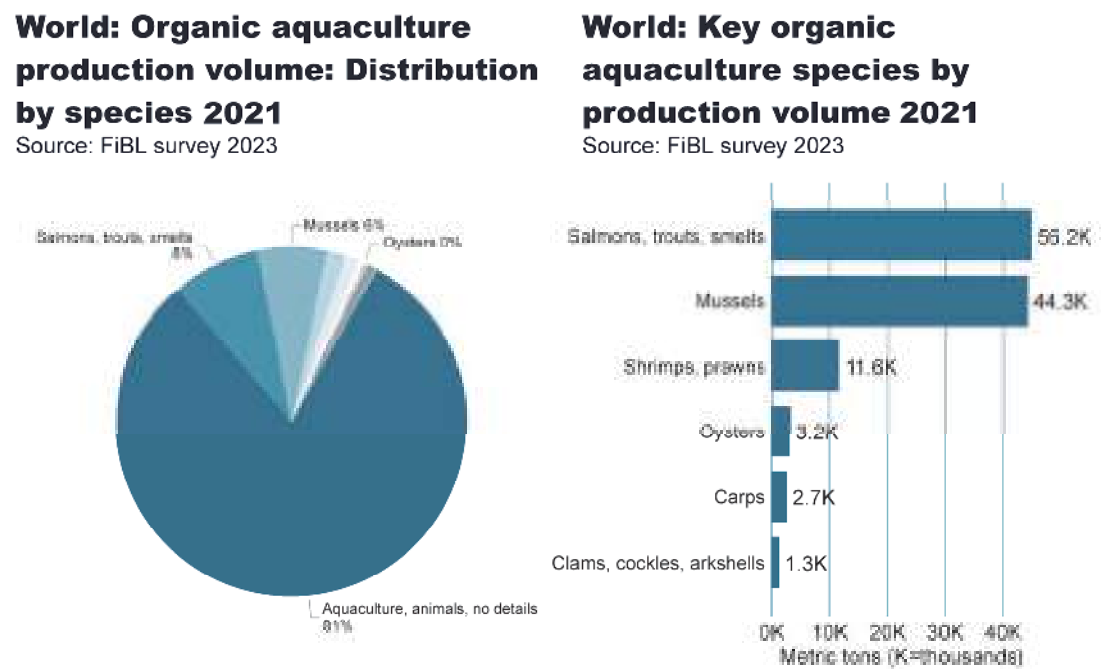


Figure 27: World: Organic aquaculture production volume: Distribution by species and key species 2021

Source: FiBL-survey 2023; based on national data sources and certifier data. For detailed data sources, see annex, page 338

Table 25: Organic aquaculture: Production volume by country 2021

Country	Production [MT]
Austria	233
Bangladesh	342
Belgium	0
Bulgaria	1'836
China	562'800
Croatia	888
Czech Republic	1
Denmark	5'487
France	8'955
Germany	8'573
Greece	1'574
Hungary	1'740
Iceland	3
Ireland	18'050
Italy	10'167
Latvia	8
Lithuania	614
Netherlands	15'277
Norway	26'999
Poland	888
Portugal	1'100
Romania	352
Slovenia	713
Spain	4'891
Switzerland	370
United Kingdom	13'128
Viet Nam	4'299
Total	**689'287**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

References and further reading

European Market Observatory for fisheries and aquaculture (EUMOFA) (2022): Organic Aquaculture in the EU. European Commission, Brussels. Available at https://www.eumofa.eu/documents/20178/432372/Organic%20aquaculture%20in%20the%20EU_final%20report_ONLINE.pdf

Food and Agriculture Organization of the United Nations (FAO) (2010): Organic aquaculture: The future of expanding niche markets. Available at http://www.fao.org/docrep/015/i2734e/i2734e04c.pdf

Potts, Jason; Wilkings, Ann; Lynch, Matthew; and McFatridge, Scott (Eds.) (2016): State of Sustainability Initiatives Review: Standards and the Blue Economy. International Institute for Sustainable Development, Manitoba, Canada. Available at https://www.iisd.org/publications/state-sustainability-initiatives-review-standards-and-blue-economy

Statistics on selected crops

In this section, some of the data on key crops and crop groups is presented, including the area under organic management compared with the total area of the crops. FiBL collected land use and crop data for the first time in 2004; hence, the development graphs show the growth since that year.

Also in this edition, we are presenting graphs on selected crops and crop groups: A map on the global distribution by country for a given crop/crop group, its development, the top then countries in terms of organic area and organic share of total, the distribution by continent and, in the case of crop groups, the breakdown by crop. All these graphics are based on interactive Power BI graphs, which you can explore at https://statistics.fibl.org/visualisation.html.

It should be noted that the organic areas are mainly compared with the area harvested as provided by FAO and Eurostat. The data may not necessarily be directly comparable to the areas sown or planted as registered by the certification bodies.

Data on conversion status: For some countries, data were collated from several certifiers, some of which provided information on the conversion status while others did not. In those cases where the certifiers did not include information status, we assumed that land was fully converted. The tables presented in this section are only part of the information available in the FiBL crop database, which is available at statistics.fibl.org.

Furthermore, at www.organic-world.net slides on key crops are available.

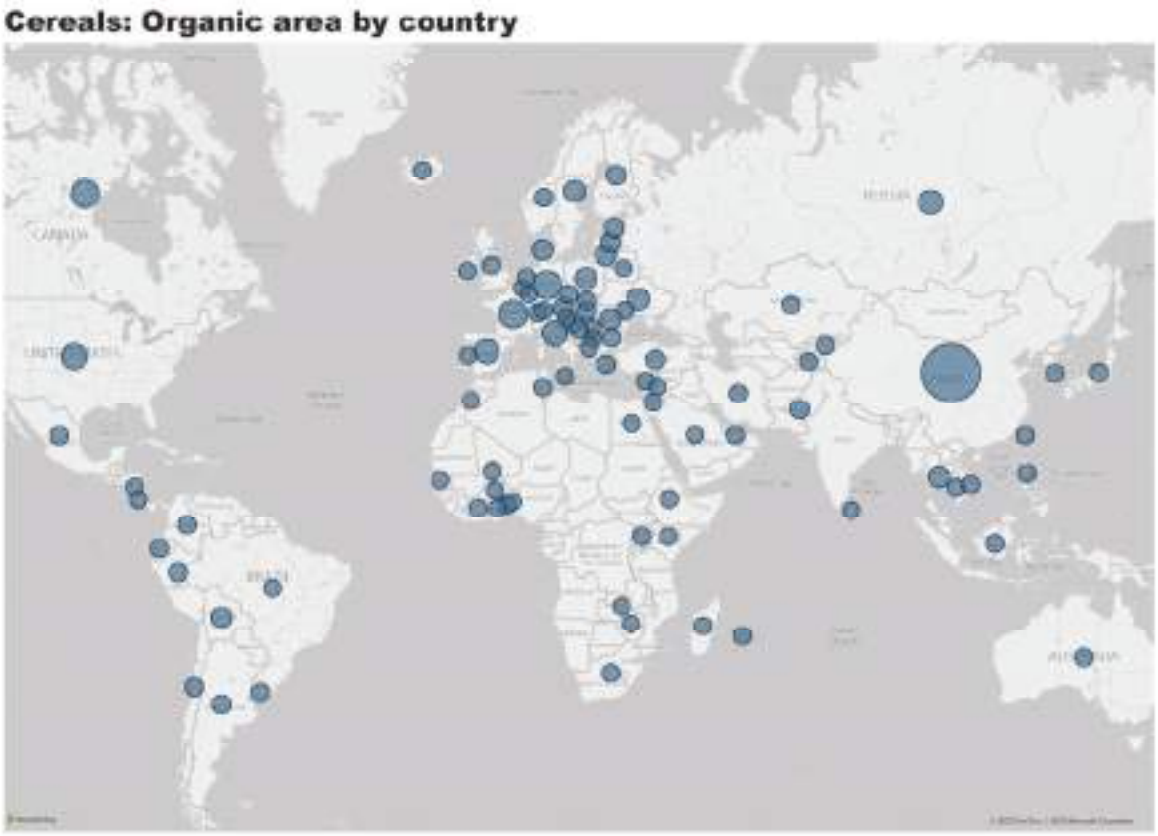
Table 26: World: Selected key crop groups and crops area in organic agriculture 2021 (overview including conversion areas)

Crop	Africa [ha]	Asia [ha]	Europe [ha]	Latin America [ha]	North America [ha]	Oceania [ha]	Total [ha]
Cereals	16'510	1'653'261	2'947'005	161'447	661'473	41'293	5'480'988
Citrus fruit	7'204	13'393	54'904	33'697	5'403		114'600
Cocoa	287'655	380		179'689		1'935	469'659
Coffee	313'325	73'799		466'922	115	68'238	922'399
Dry pulses	3'563	30'230	569'895	17'918	111'703		733'308
Fruit temperate	3'345	112'935	156'654	9'711	19'184		301'829
Fruit, tropical/ subtropical	124'114	41'411	38'565	120'773	5'122	34	330'019
Grapes	5'129	14'861	435'216	20'307	28'736	5'783	510'033
Oilseeds	219'851	723'168	921'718	73'619	160'199		2'098'555
Olives	264'445	9'394	618'525	9'609	628		902'601
Vegetables	38'881	59'066	230'155	29'600	84'147	4'035	445'884

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

› Cereals

In 2021, almost 5.5 million hectares or 0.7 percent of the global cereal area was under organic management.



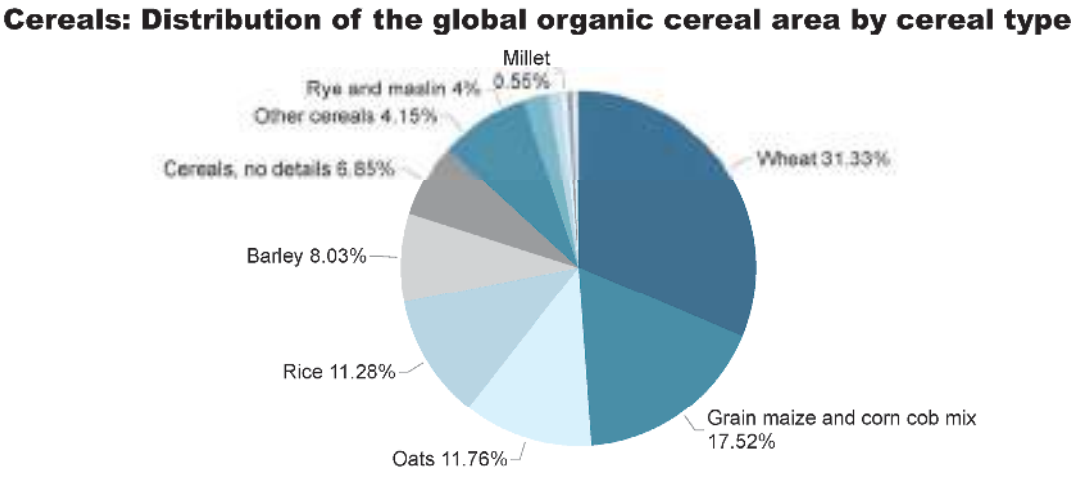


Figure 28: Cereals: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

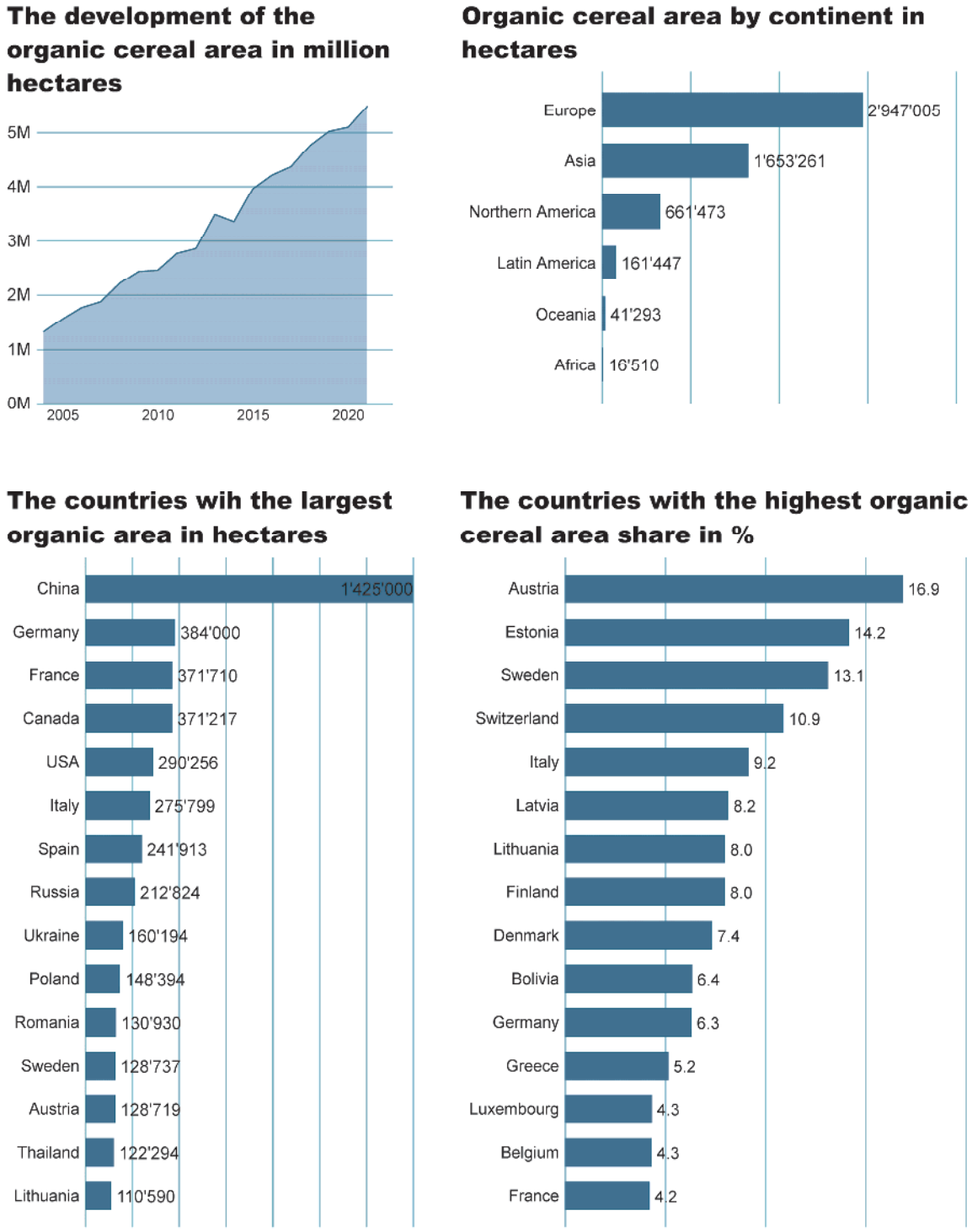


Figure 29: Cereals: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 27: Cereals: Organic area by country 2021

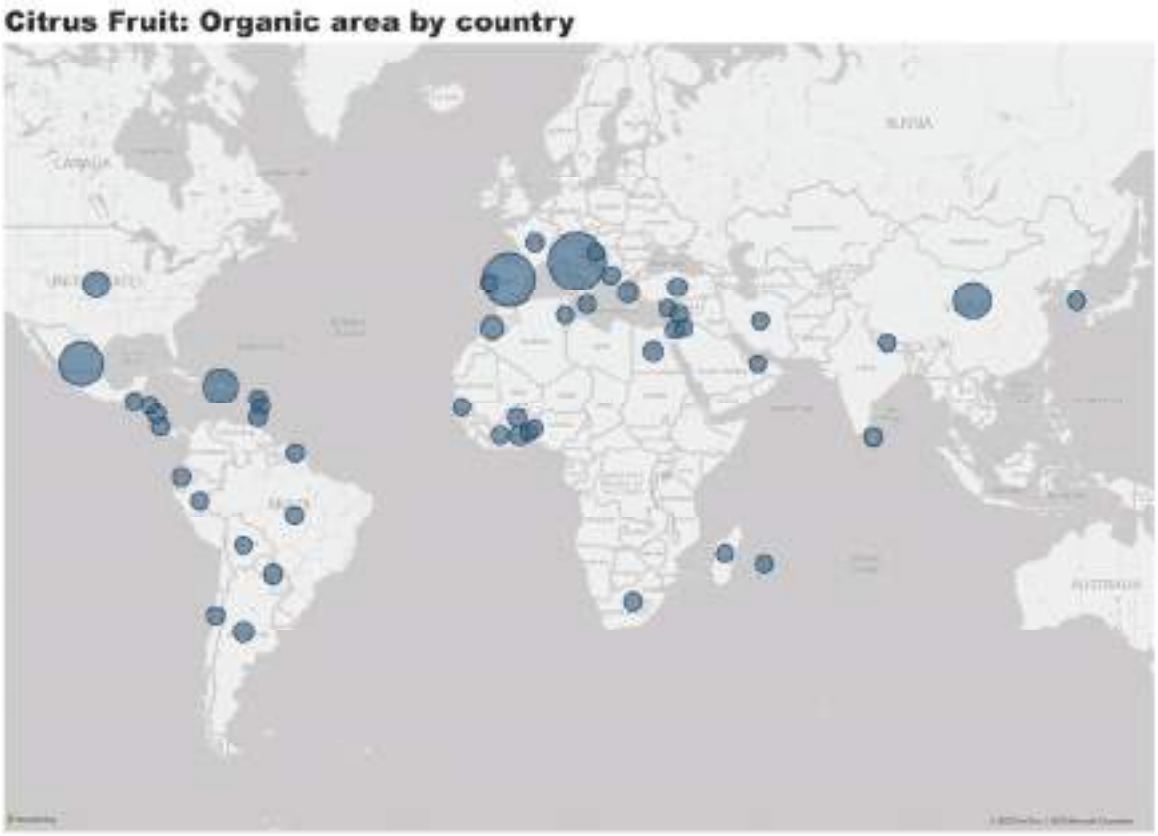
Country/Territory	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Albania	1	0.00	0	1
Argentina	22'729	0.13	22'729	
Australia	41'293	0.21	41'293	
Austria	128'719	16.86		
Belarus	689	0.03	689	
Belgium	13'179	4.33	10'372	2'807
Benin	15	0.00	15	0
Bolivia	94'012	6.35	6'102	87'910
Bosnia and Herzegovina	138	0.04	138	
Brazil	2'360	0.01	2'360	
Bulgaria	10'943	0.54	10'943	
Burkina Faso	507	0.01	507	
Cambodia	17'554	0.51	17'554	
Canada	371'217	2.46	371'217	
Chile	332	0.07	332	
China	1'425'000	1.42	1'047'000	378'000
Colombia	186	0.02	186	
Costa Rica	65	0.18	65	
Côte d'Ivoire	58	0.00	58	
Croatia	12'819	2.39	12'819	1'939
Cyprus	771	2.41	645	126
Czech Republic	42'269	3.14	37'061	5'208
Congo D.R.	938	0.02	938	
Denmark	99'829	7.35	76'563	23'268
Ecuador	433	0.06	346	87
Egypt	8'946	0.29	8'946	
Estonia	52'440	14.18	47'884	4'556
Ethiopia	50	0.00		
Finland	76'384	7.98	76'384	
France	371'710	4.23	245'898	125'812
Germany	384'000	6.33		
Ghana	435	0.02	435	
Greece	38'108	5.16	27'509	10'599
Hungary	38'905	1.64	30'902	8'003
Iceland	64	2.69	51	13
Indonesia	211	0.00	211	
Iran	182	0.00	177	5
Ireland	4'010	1.51	3'217	793
Israel	759	0.99	749	10
Italy	275'799	9.16	275'799	
Japan	3'063	0.17	3'063	
Kazakhstan	28'414	0.18	27'563	417
Kenya	272	0.01	272	
Kosovo	135	0.00	135	
Kyrgyzstan	1'588	0.27		
Lao	2'931	0.26	2'326	605
Latvia	60'865	8.15	56'348	4'518
Lebanon	40	0.06	40	
Liechtenstein	81	0.00	81	
Lithuania	110'590	7.99	90'481	20'108
Luxembourg	1'099	4.34	1'099	
Madagascar	21	0.00	21	
Mali	310	0.01	310	
Malta	4	0.00	4	
Mexico	9'671	0.10	9'671	
Moldova	11'297	1.20	7'931	3'367
Morocco	104	0.00	91	13
Netherlands	4'483	2.58	4'088	395
Nicaragua	2'633	0.68	1'074	1'559
Norway	6'668	2.35		

Country/Territory	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Pakistan	38'719	0.26	38'581	138
Palestine	72	0.29	72	
Peru	28'279	2.36	16'671	11'608
Philippines	76	0.00	76	
Poland	148'394	2.14	113'980	34'414
Portugal	5'206	2.41	4'689	517
Republic of Korea	1'686	0.21		
Réunion (France)	0.3	0.00	0.15	0.15
Romania	130'930	2.33	93'131	37'926
Russia	212'824	0.49	15'496	3'146
Saudi Arabia	781	0.33	631	150
Senegal	268	0.01	268	
Serbia	4'140	0.23	2'787	1'353
Slovakia	23'211	1.82	19'623	3'587
Slovenia	2'568	1.63	2'261	307
South Africa	1'868	0.05	1'862	6
Spain	241'913	3.99	187'747	11'724
Sri Lanka	65	0.01	65	0
Sweden	128'737	13.13	118'906	9'831
Switzerland	15'972	10.91		
Taiwan	3'394	1.30	3'394	
Tajikistan	1'569	0.42	372	48
Thailand	122'294	0.96		
Togo	1'444	0.12	1'444	
Tunisia	725	0.06	725	
Türkiye	80'316	0.75	61'145	19'171
Uganda	335	0.02	79	
Ukraine	160'194	1.02	128'320	21'696
United Arab Emirates	0.3	0.03		0.3
United Kingdom	46'600	1.46	43'200	3'400
United States of America	290'256	0.53	290'256	
Uruguay	748	0.10	170	578
Viet Nam	4'862	0.06	3'485	1'378
Zambia	213	0.01	213	
Zimbabwe	1	0.00	1	
World	**5'480'988**	**0.74**	**3'733'674**	**841'095**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338
Blank cells: No data available

› Citrus fruit

In 2021, over 115'000 hectares or 1.1 percent of the global citrus fruit area was under organic management.



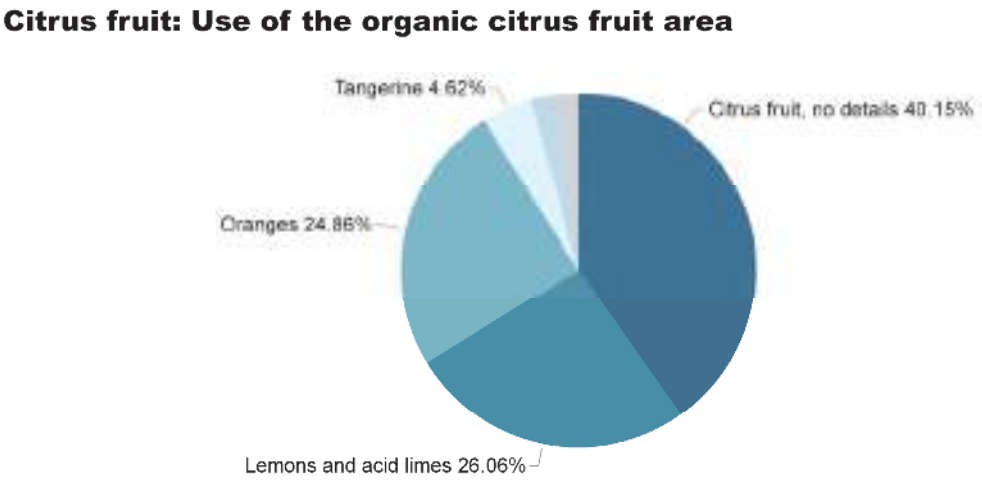


Figure 30: Citrus fruit: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

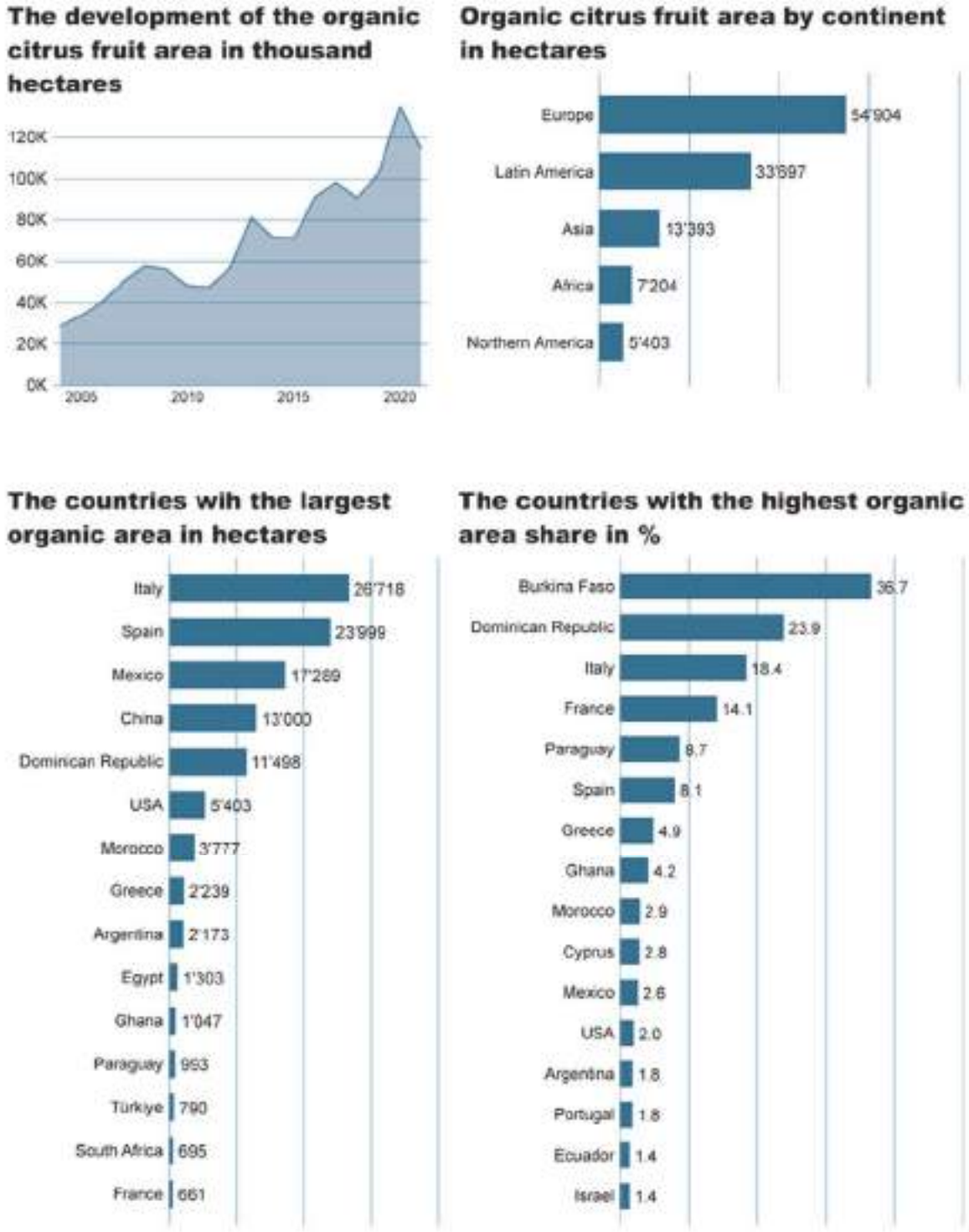


Figure 31: Citrus fruit: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 28: Citrus fruit: Organic area by country 2021

Country	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Albania	1	0.04		1
Argentina	2'173	1.84	2'173	
Benin	1	0.01	1	0
Bolivia	0.1	0.00	0.1	
Brazil	386	0.06	326	59
Burkina Faso	88	36.67	88	
Chile	199	0.76	199	
China	13'000	0.43	7'000	6'000
Costa Rica	6	0.02	6	
Côte d'Ivoire	7	0.06	7	
Croatia	18	0.86	18	8
Cyprus	86	2.83	73	13
Dominican Republic	11'498	23.92	11'498	
Ecuador	514	1.42	503	11
Egypt	1'303	0.68	1'303	
France	661	14.12	409	252
French Guiana (France)	47	0.00	24	23
Ghana	1'047	4.19	1'047	
Greece	2'239	4.91	1'199	1'040
Grenada	0.05	0.01	0.05	
Guadeloupe (France)	6	0.00	5	1
Guatemala	224	0.94	224	
Honduras	27	0.25	27	
Iran	21	0.02	21	
Israel	247	1.42	229	18
Italy	26'718	18.41	26'718	
Jordan	13	0.19		
Lebanon	27	0.24	25	3
Madagascar	21	0.13	21	
Malta	0.14	0.00	0.14	
Martinique (France)	4	0.00	4	0
Mexico	17'289	2.62	17'289	
Morocco	3'777	2.89	3'294	483
Nepal	6	0.02	6	
Nicaragua	106	0.44	57	49
Palestine	1	0.05	1	
Paraguay	993	8.74	802	192
Peru	226	0.27	102	124
Portugal	392	1.82	325	67
Republic of Korea	60	0.27		
Réunion (France)	81	0.00	67	14
Senegal	1	0.02	1	
South Africa	695	0.71	617	78
Spain	23'999	8.05	14'715	6'259
Sri Lanka	18	0.11	18	
Togo	3	0.08	3	
Tunisia	180	0.36	180	
Türkiye	790	0.45	360	430
United Arab Emirates	0.28	0.06	0.18	0.1
USA	5'403	1.99	5'403	
World	**114'600**	**1.12**	**96'386**	**15'125**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338. Blank cells: No data available.

› Cocoa beans

In 2021, almost 470'000 hectares or 4.0 percent of the global cocoa area was under organic management.

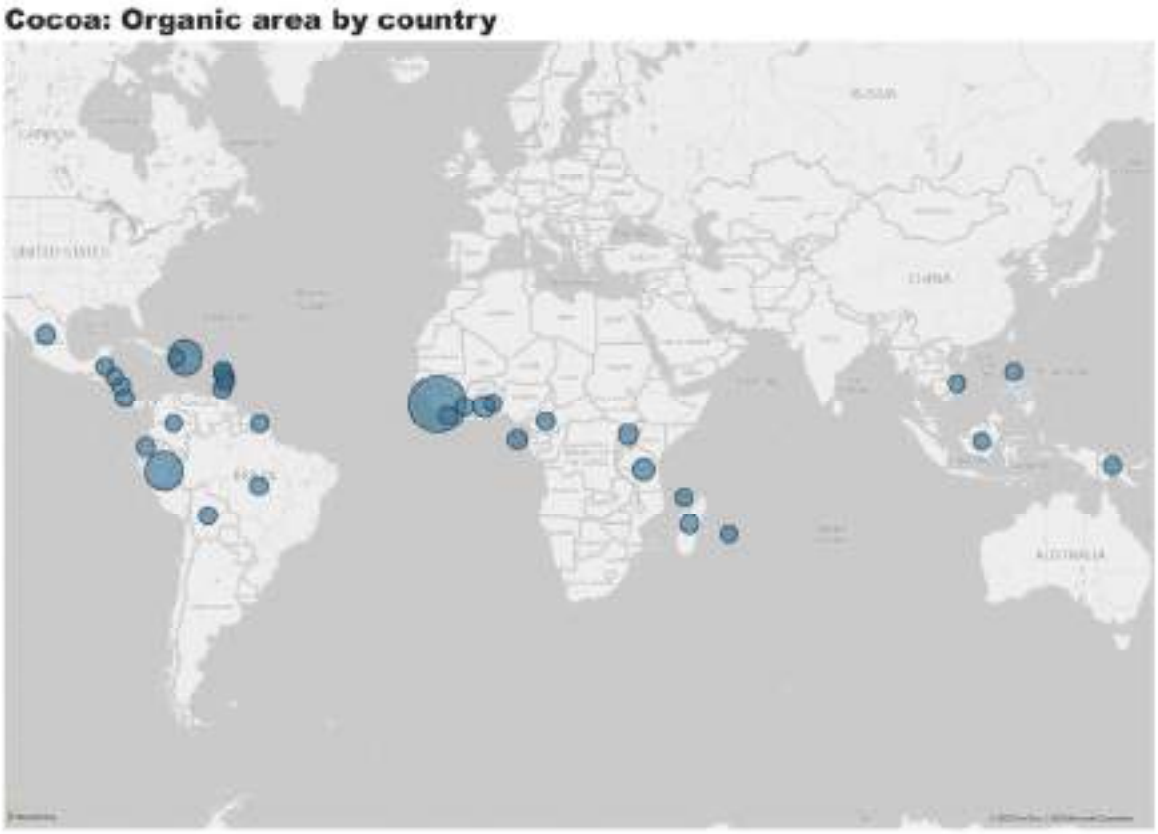


Figure 32: Cocoa: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

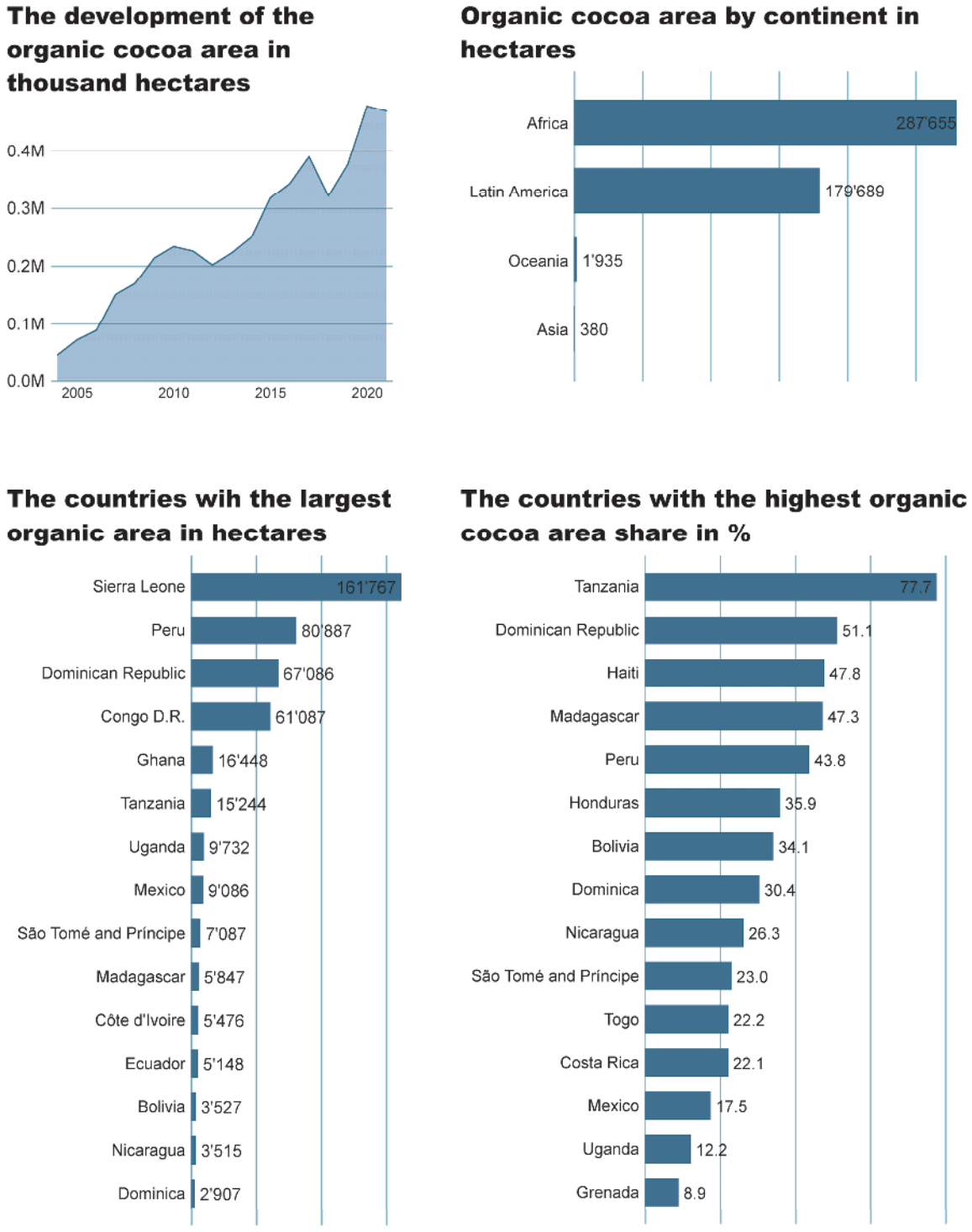


Figure 33: Cocoa: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 29: Cocoa: Organic area by country 2021

Country	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Belize	676	NA	676	
Bolivia	3'527	34.13	3'527	
Brazil	1'259	0.21	744	515
Cameroon	525	0.07	466	59
Colombia	150	0.08	150	
Congo D.R.	61'087	NA	61'087	
Costa Rica	1'361	22.13	1'361	
Côte d'Ivoire	5'476	0.13	5'468	9
Dominica	2'907	30.41	2'907	
Dominican Republic	67'086	51.11	54'213	12'873
Ecuador	5'148	0.95	4'144	1'004
French Guiana (France)	8	0.00	6	2
Ghana	16'448	1.13	16'448	
Grenada	88	8.92	88	
Guadeloupe (France)	3	0.00	3	0
Haiti	1'955	47.75	1'955	
Honduras	1'954	35.91	1'567	387
Indonesia	325	0.02	325	
Liberia	2'791	3.00	2'791	0
Madagascar	5'847	47.30	5'847	
Martinique (France)	54	0.00	39	15
Mayotte	1	0.00	0	1
Mexico	9'086	17.49	9'086	
Nicaragua	3'515	26.27	2'694	821
Papua New Guinea	1'935	1.80		
Peru	80'887	43.76	56'984	23'903
Philippines	49	0.16	49	
Réunion (France)	10	0.00	3	7
Saint Lucia	25	NA	25	
Sao Tome and Principe	7'087	23.04	7'087	
Sierra Leone	161'767	NA	161'767	
Tanzania	15'244	77.66	15'244	0
Togo	1'640	22.16	1'631	9
Uganda	9'732	12.21	9'729	
Viet Nam	6	0.15	6	
World	**469'659**	**4.0**	**428'118**	**39'603**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338, Blank cells: No data available.

For more information on cocoa production (organic and other Voluntary Sustainability Standards - VSS), please see the report "The State of Sustainable Markets – Statistics and Emerging Trends 2021."[1]

[1] Willer, H. et al. (2023) (Eds.) The State of Sustainable Markets 2022: Statistics and Emerging Trends. ITC, Geneva. Available at: https://vss.fibl.org/.
For interactive online graphics see the Sustainability Map at: https://www.sustainabilitymap.org/trends

› Coffee

In 2021, over 922'000 hectares or 8.1 percent of the global coffee area was under organic management.

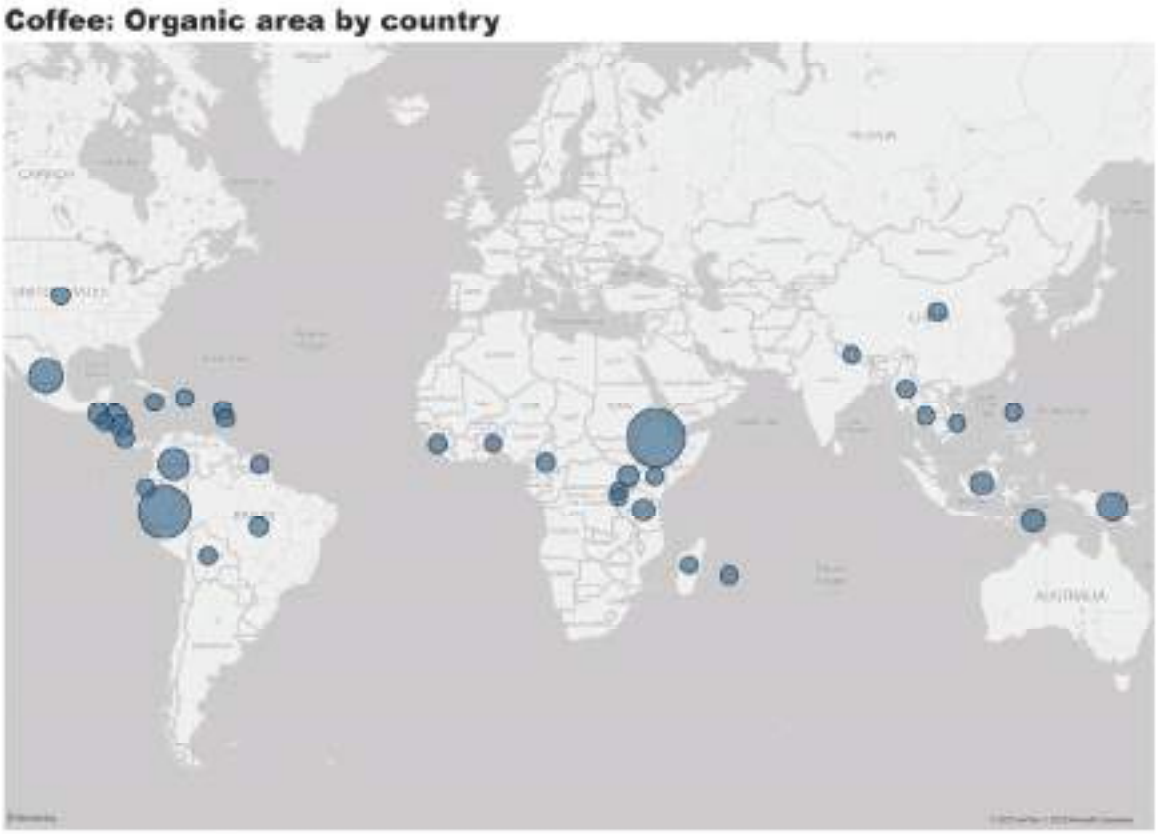


Figure 34: Coffee: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

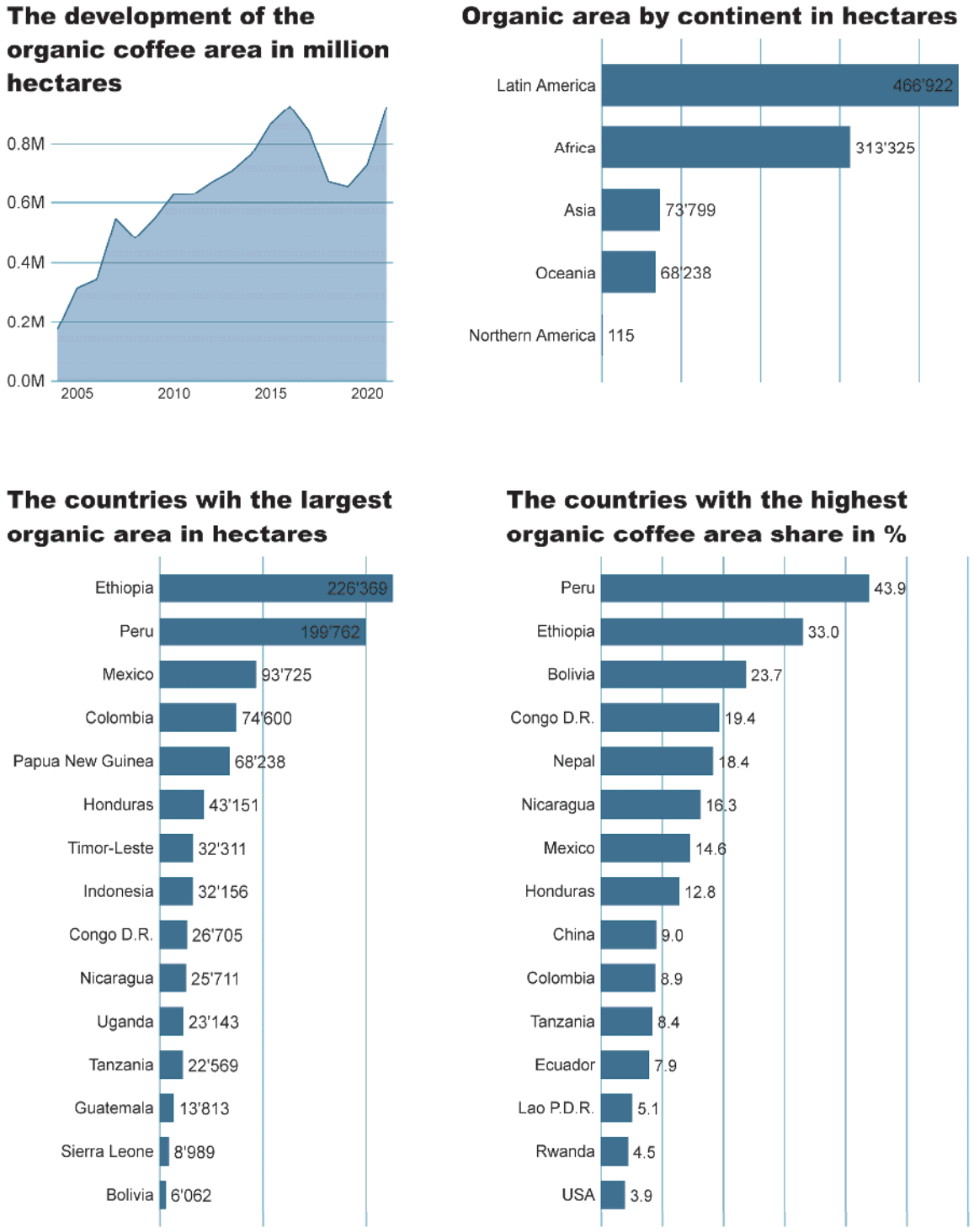


Figure 35: Coffee: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 30: Coffee: Organic area by country 2021

Country	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Bolivia	6'062	23.73	5'889	172
Brazil	4'718	0.26	588	131
Burundi	48	0.25	48	
Cameroon	371	0.32	371	
China	3'000	9.04	2'000	1'000
Colombia	74'600	8.88	74'600	
Congo D.R.	26'705	19.39	26'704	1
Costa Rica	460	0.52	460	
Dominican Republic	198	0.57	198	
Ecuador	2'332	7.91	1'776	555
El Salvador	2'371	1.64	2'271	100
Ethiopia	226'369	33.03	192'146	276
Guadeloupe (France)	9	0.00	5	4
Guatemala	13'813	3.80	13'813	
Honduras	43'151	12.83	43'018	133
Indonesia	32'156	2.57	31'271	885
Jamaica	11	0.10	1	
Kenya	4'083	3.77	4'083	
Lao	4'281	5.14	4'281	
Madagascar	119	0.15	119	
Martinique (France)	1	0.00	0	0
Mexico	93'725	14.60	93'725	
Myanmar	67	0.53	67	
Nepal	432	18.36	2	
Nicaragua	25'711	16.28	24'055	1'655
Papua New Guinea	68'238			
Peru	199'762	43.93	140'285	59'477
Philippines	25	0.02	25	
Réunion (France)	6	0.00	6	0
Rwanda	811	4.45	811	0
Sierra Leone	8'989		8'989	
Tanzania	22'569	8.44	22'515	54
Thailand	1'267	2.66		
Timor-Leste	32'311		32'311	
Togo	111	0.28	111	
Uganda	23'143	3.34	3'021	
United States of America	115	3.93	115	
Viet Nam	259	0.04	139	120
World	**922'399**	**8.1**	**729'819**	**64'564**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338. Blank cells: No data available. For more information on coffee production (organic and other Voluntary Sustainability Standards - VSS), please see the report "The State of Sustainable Markets – Statistics and Emerging Trends 2022.[1]

[1] Willer et al. (2023) (Eds): The State of Sustainable Markets 2022: Statistics and Emerging Trends. ITC, Geneva. Available at: https://vss.fibl.org. For interactive online graphics see the Sustainability Map at: https://www.sustainabilitymap.org/trends

› Dry pulses

In 2021, around 733'000 hectares or 0.8 percent of the global dry pulses area was under organic management.

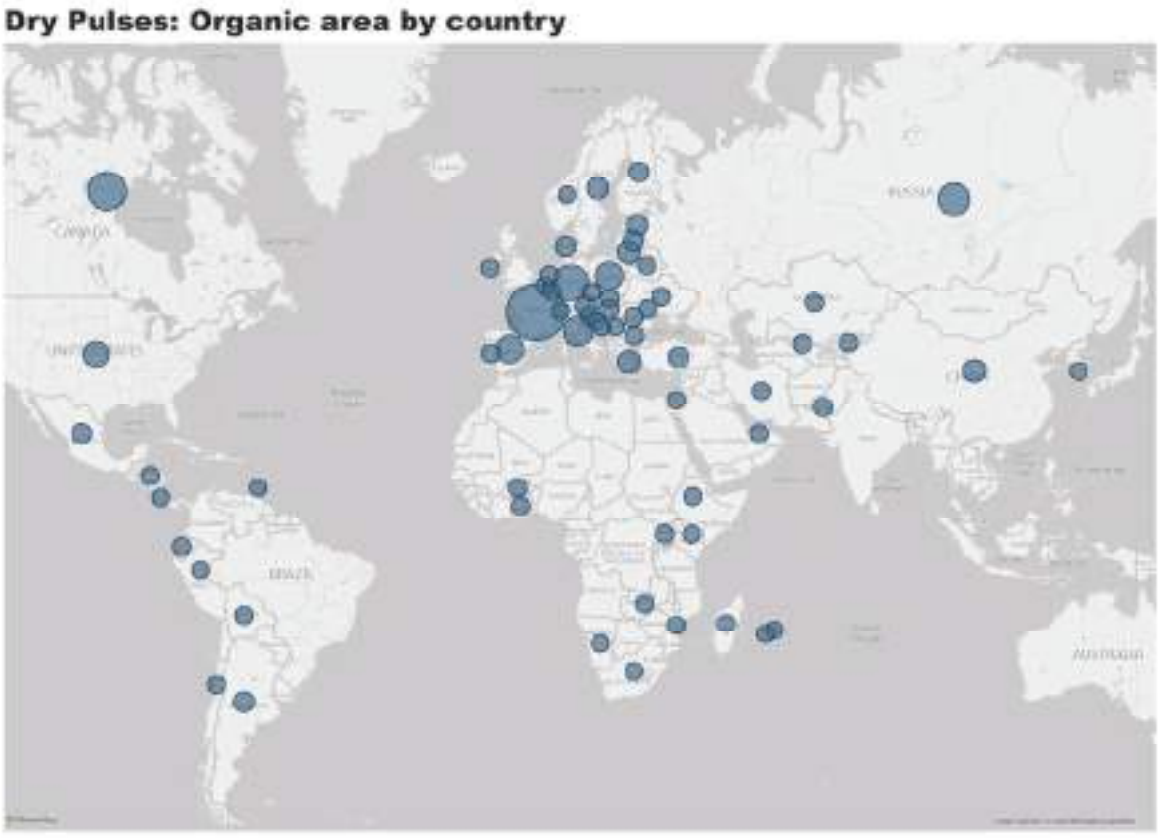


Figure 36: Dry Pulses: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. Online at https://statistics.fibl.org/visualisation.html

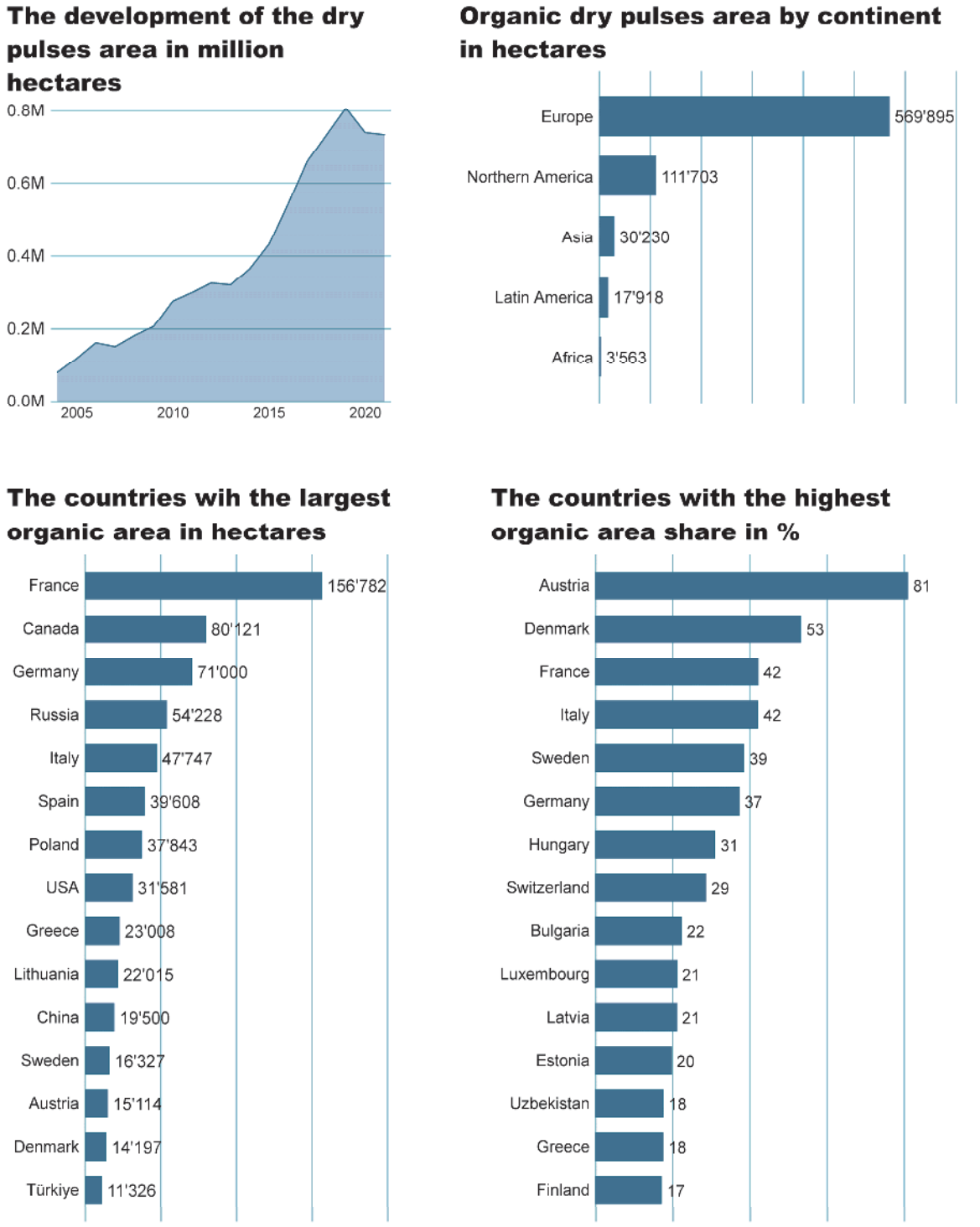


Figure 37: Dry Pulses: Organic area 2021

Source: FiBL survey 2023 based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 31: Dry pulses: Organic area by country 2021

Country	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Argentina	9'227	1.28	9'227	
Austria	15'114	81.04		
Belarus	20	0.01	20	
Belgium	471	7.85	406	65
Bolivia	80	0.08	80	
Bosnia and Herzegovina	24	0.22	24	
Bulgaria	5'658	22.45	5'658	
Burkina Faso	168	0.01	168	
Canada	80'121	2.32	80'121	
Chile	67	0.21	67	
China	19'500	0.76	14'100	5'400
Costa Rica	19	0.11	19	
Croatia	56	2.95	56	23
Czech Republic	5'034	13.49	4'638	396
Denmark	14'197	53.37	9'825	4'372
Ecuador	10	0.02	10	
Estonia	9'815	19.81	8'407	1'408
Ethiopia	2'670	0.17		
Finland	7'052	17.24	7'052	
France	156'782	42.27	117'288	39'494
Germany	71'000	37.35		
Ghana	49	0.02	49	
Greece	23'008	17.60	15'900	7'108
Grenada	7	4.56	7	
Hungary	3'787	31.09	3'356	431
Iran	34	0.01	34	
Ireland	155	1.13	72	83
Israel	12	0.25	12	
Italy	47'747	42.24	47'747	
Kazakhstan	3'906	1.08	3'906	
Kenya	215	0.01	215	
Kyrgyzstan	1'650	3.15		
Latvia	9'255	21.18	8'552	703
Lithuania	22'015	16.38	18'826	3'190
Luxembourg	81	21.22	81	
Madagascar	244	0.23	244	
Mexico	8'483	0.47	8'483	
Moldova	1'713	5.52	1'257	456
Mozambique	13	0.00	6	7
Namibia	7	8.24	7	0
Netherlands	276	6.67	264	12
Norway	366	11.48		
Pakistan	3'216	0.26	3'216	
Peru	25	0.01	10	15
Poland	37'843	12.01	25'819	12'025
Portugal	1'793	9.45	1'740	53
Republic of Korea	64	1.14		
Romania	6'152	5.70	4'615	1'537
Russian Federation	54'228	2.70	5'628	1'290
Serbia	187	0.87	187	
Slovakia	2'263	9.77	1'682	581
Slovenia	66	4.96	59	7
South Africa	174	0.25	174	
Spain	39'608	10.79	32'703	2'432
Sweden	16'327	38.60	14'640	1'687

Country	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Switzerland	1'574	28.70		
Türkiye	11'326	1.20	6'266	5'060
Uganda	15	0.00	15	
Ukraine	4'904	1.62	1'854	
United Arab Emirates	1	0.00	1	
United States of America	31'581	2.54	31'581	
Uzbekistan	1'848	17.66		
Zambia	7	0.01	7	
World	**733'308**	**0.8**	**496'380**	**87'834**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338
Blank cells: No data available

Temperate Fruit

In 2021, around 302'000 hectares or 2.6 percent of the global temperate fruit area was under organic management.

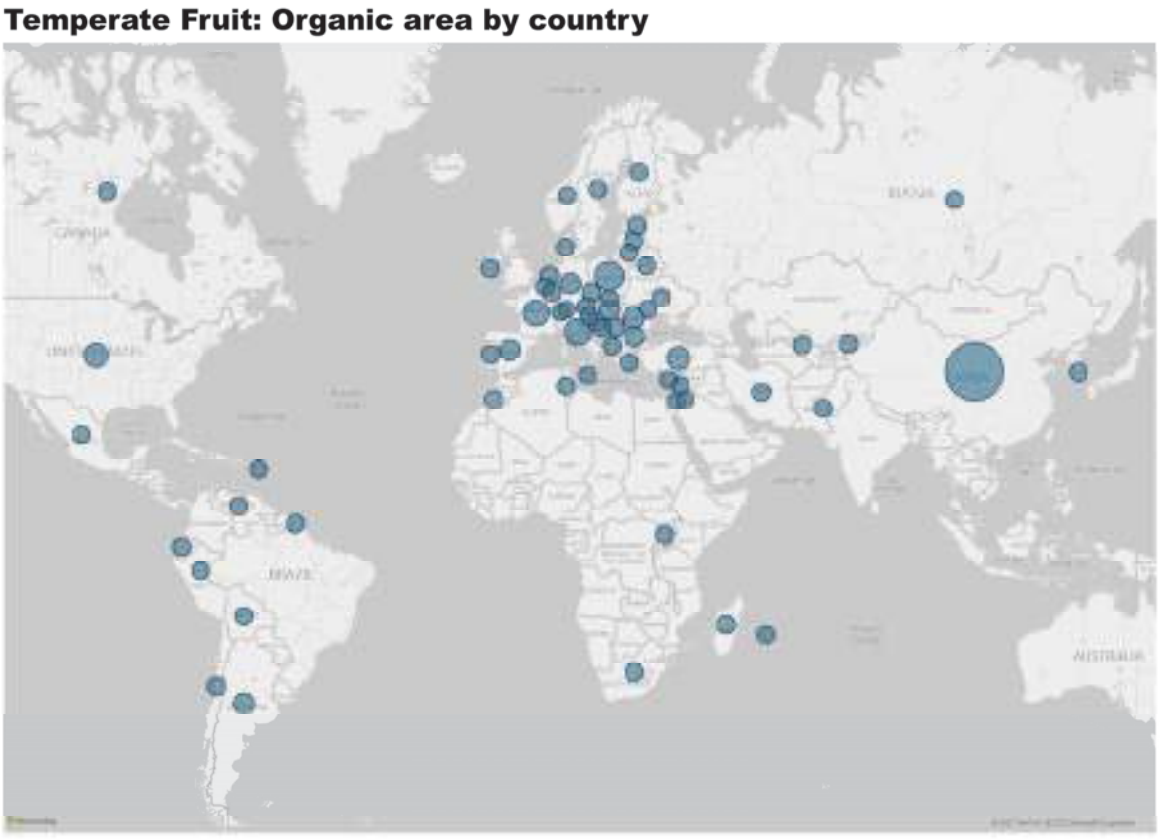


Figure 38: Temperate fruit: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

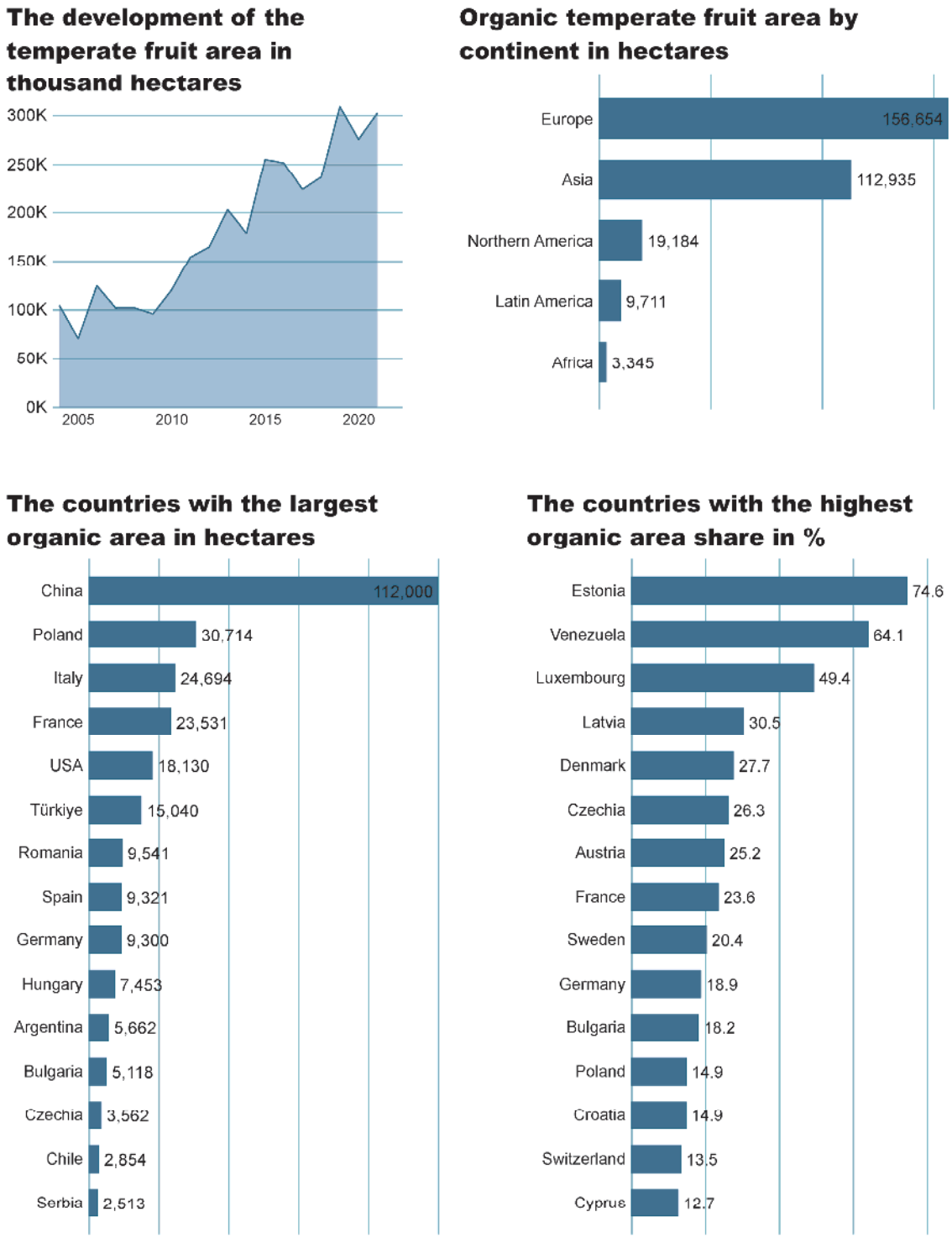


Figure 39: Temperate Fruit: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 32: Temperate fruit: Organic area by country 2021

Country	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Albania	21	0.14	5	16
Argentina	5'662	7.87	5'662	
Austria	2'135	25.15		
Belarus	16	0.03	16	
Belgium	571	3.30	383	188
Bolivia	2	0.02	2	
Bosnia and Herzegovina	2	0.00	2	0
Bulgaria	5'118	18.23	5'118	
Canada	1'054	4.75	1'054	
Chile	2'854	2.42	2'854	
China	112'000	1.89	63'000	49'000
Croatia	1'886	14.87	1'886	747
Cyprus	201	12.72	170	31
Czech Republic	3'562	26.25	3'243	319
Denmark	659	27.69	565	94
Estonia	485	74.62	446	39
Finland	64	8.89	64	
France	23'531	23.60	16'535	6'995
French Guiana (France)	4	0.00	4	0
Germany	9'300	18.87		
Greece	1'244	1.23	905	341
Hungary	7'453	11.71	4'346	3'107
Iran	188	0.06	188	
Ireland	66	9.30	62	4
Israel	29	0.35	26	3
Italy	24'694	12.38	24'694	
Kyrgyzstan	249	0.57		
Latvia	1'311	30.49	1'169	139
Lebanon	58	0.19	50	8
Liechtenstein	2	0.00	2	
Lithuania	672	5.07	608	64
Luxembourg	64	49.43	64	
Madagascar	8	0.07	8	
Mexico	187	0.17	187	
Moldova	716	0.73	697	19
Morocco	911	0.89	718	193
Netherlands	664	3.84	572	92
Norway	216	9.58		
Pakistan	128	0.11	128	0
Peru	3	0.02	3	
Poland	30'714	14.93	26'399	4'314
Portugal	1'435	3.61	1'207	228
Republic of Korea	130	0.19		
Réunion (France)	7	0.00	5	2
Romania	9'541	7.15	6'100	3'441
Russian Federation	5	0.00	0	4
Serbia	2'513	1.75	1'916	597
Slovakia	534	8.97	475	59
Slovenia	412	6.94	366	45
South Africa	1'281	1.90	1'281	
Spain	9'321	4.97	6'459	1'717
Sweden	334	20.37	285	49
Switzerland	935	13.46		
Tunisia	1'135	1.93	1'135	
Türkiye	15'040	2.93	9'472	5'568

Country	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Uganda	4	0.00		
Ukraine	1'218	0.77	1'148	70
USA	18'130	7.57	18'130	
Uzbekistan	153	0.07	153	
Venezuela	1'000	64.10	1'000	
World	**301'829**	**2.6**	**211'397**	**77'492**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338
Blank cells: No data available.

› Fruit: Tropical and subtropical fruit

In 2021, around 330'000 hectares or 1.1 percent of the global tropical and subtropical fruit area was under organic management.

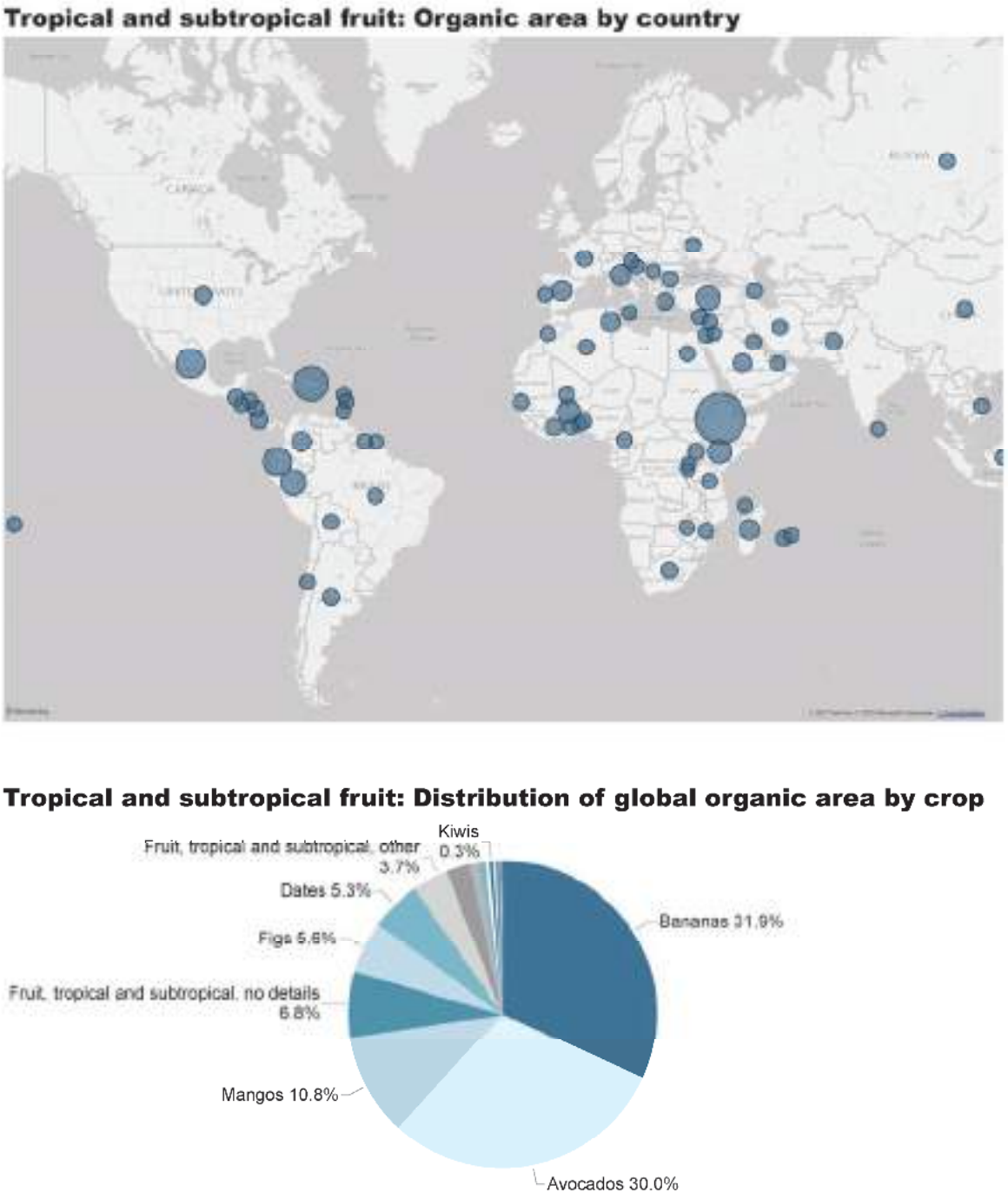


Figure 40: Tropical and subtropical fruit: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

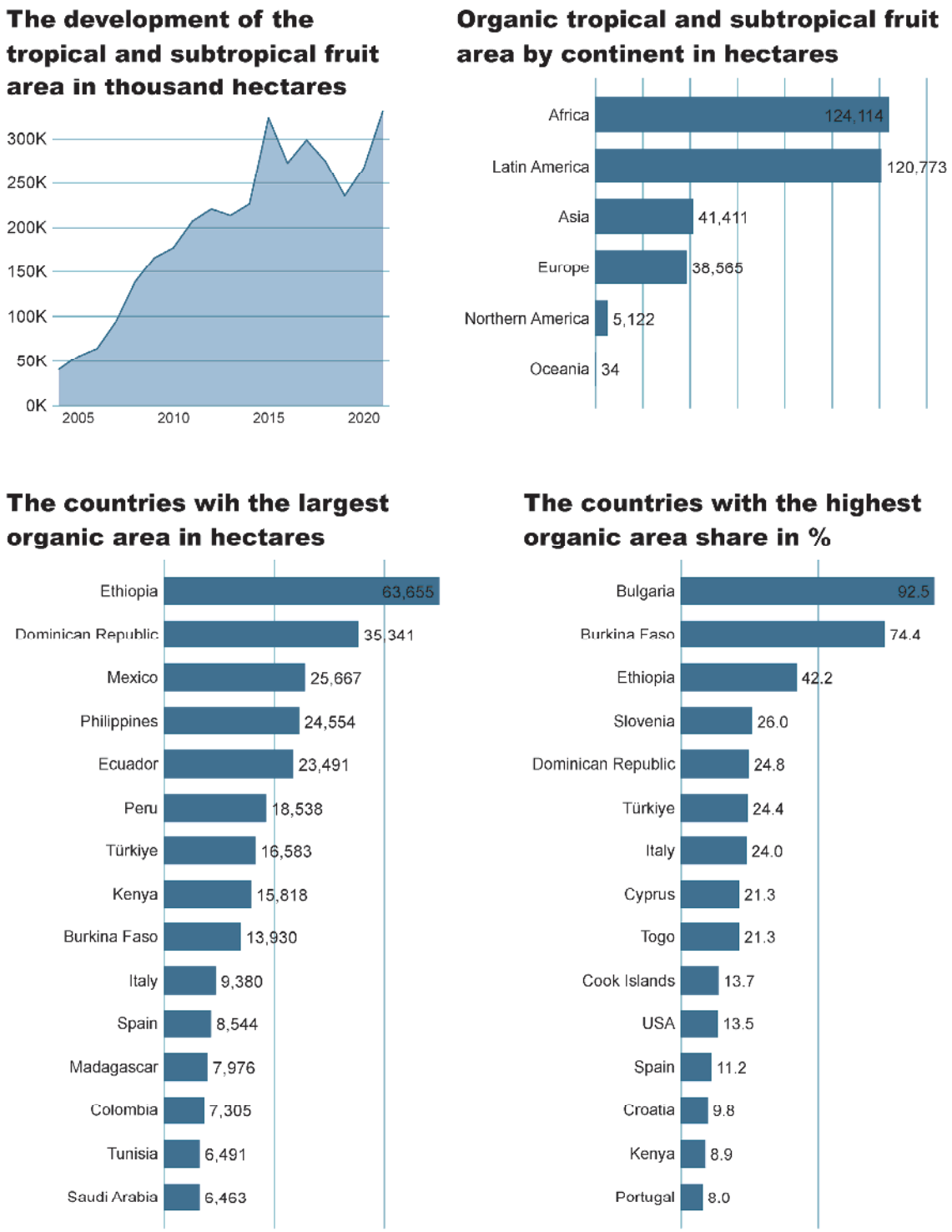


Figure 41: Tropical and subtropical fruit: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 33: Tropical and subtropical fruit: Organic area by country 2021

Country/Territory	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Algeria	564	0.27	564	
Argentina	303	3.05	303	
Azerbaijan	450	3.31		
Benin	7	0.05	7	0
Bolivia	2	0.00	2	
Brazil	349	0.03	349	0
Bulgaria	37	92.48	37	
Burkina Faso	13'930	74.40	3'042	8
Burundi	140	0.08	140	
Cameroon	555	0.14	551	4
Chile	231	0.58	231	
China	3'000	0.05	1'000	2'000
Colombia	7'305	1.21	7'305	
Congo D.R.	7	0.00	7	
Cook Islands	15	13.70	15	
Costa Rica	4'762	4.53	4'762	
Côte d'Ivoire	3'235	0.34	3'216	19
Croatia	56	9.82	56	181
Cyprus	181	21.29	143	38
Dominican Republic	35'341	24.76	34'415	926
Ecuador	23'491	7.43	19'484	4'008
Egypt	1'802	0.66	1'802	
El Salvador	25	0.57	25	
Ethiopia	63'655	42.22	63'655	
France	1'348	6.87	866	482
French Guiana (France)	321	0.00	293	28
French Polynesia	18	3.94	18	
Ghana	1'173	0.26	1'173	
Greece	1'199	7.19	745	454
Grenada	19	0.95	19	
Guadeloupe (France)	343	0.00	170	174
Guatemala	2'221	1.84	2'221	
Honduras	179	1.00	179	0
Indonesia	19	0.00	19	
Iran (Islamic Republic of)	580	0.20	569	11
Israel	1'059	2.90	898	161
Italy	9'380	23.98	9'380	
Jordan	167	3.37		
Kenya	15'818	8.93	15'818	
Kuwait	11	0.31	11	
Lebanon	110	2.39	83	27
Madagascar	7'976	3.58	7'975	0
Mali	1'922	1.51	1'922	
Martinique (France)	248	0.00	179	69
Mauritius	2	0.26	2	
Mayotte	9	0.00	2	7
Mexico	25'667	4.15	25'667	
Morocco	791	0.51	632	159
Mozambique	807	0.70	807	
Nicaragua	1'375	6.05	1'363	12
Pakistan	2'454	0.59	2'454	
Palestine	11	0.76	5	6
Peru	18'538	5.89	13'730	4'808
Philippines	24'554	2.23	23'617	938
Portugal	1'185	8.00	964	221

Country/Territory	Organic area [ha]	Organic share [%]	Area fully converted [ha]	Area under conversion [ha]
Réunion (France)	442	0.00	325	117
Rwanda	139	0.05	139	
Saudi Arabia	6'463	4.05	4'818	1'645
Senegal	846	3.74	846	
Slovenia	52	26.00	32	20
South Africa	1'551	3.98	1'549	2
Spain	8'544	11.17	4'815	2'013
Sri Lanka	75	0.09	75	
Suriname	52	3.79	52	
Taiwan	1'771	2.12	1'771	
Tanzania	599	0.08	599	
Togo	476	21.28	476	
Tunisia	6'491	6.51	6'491	
Türkiye	16'583	24.40	12'702	3'880
Uganda	1'147	0.06	970	
United Arab Emirates	1	0.00	1	0
USA	5'122	13.49	5'122	
Viet Nam	686	0.22	481	205
Zimbabwe	29	0.12	29	
World	**330'019**	**1.1**	**294'190**	**22'625**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

› Grapes

In 2021, around 510'000 hectares or 7.5% of the global grape area was under organic management.

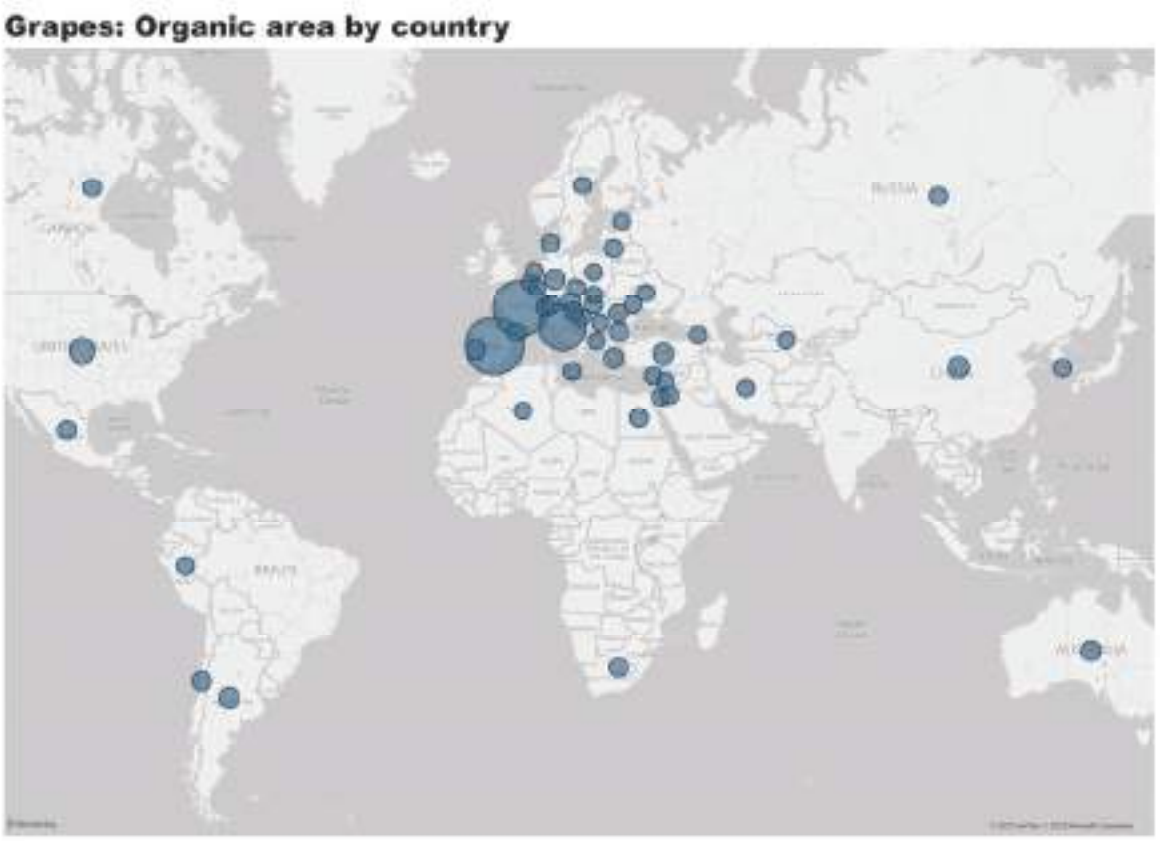


Figure 42: Grapes: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

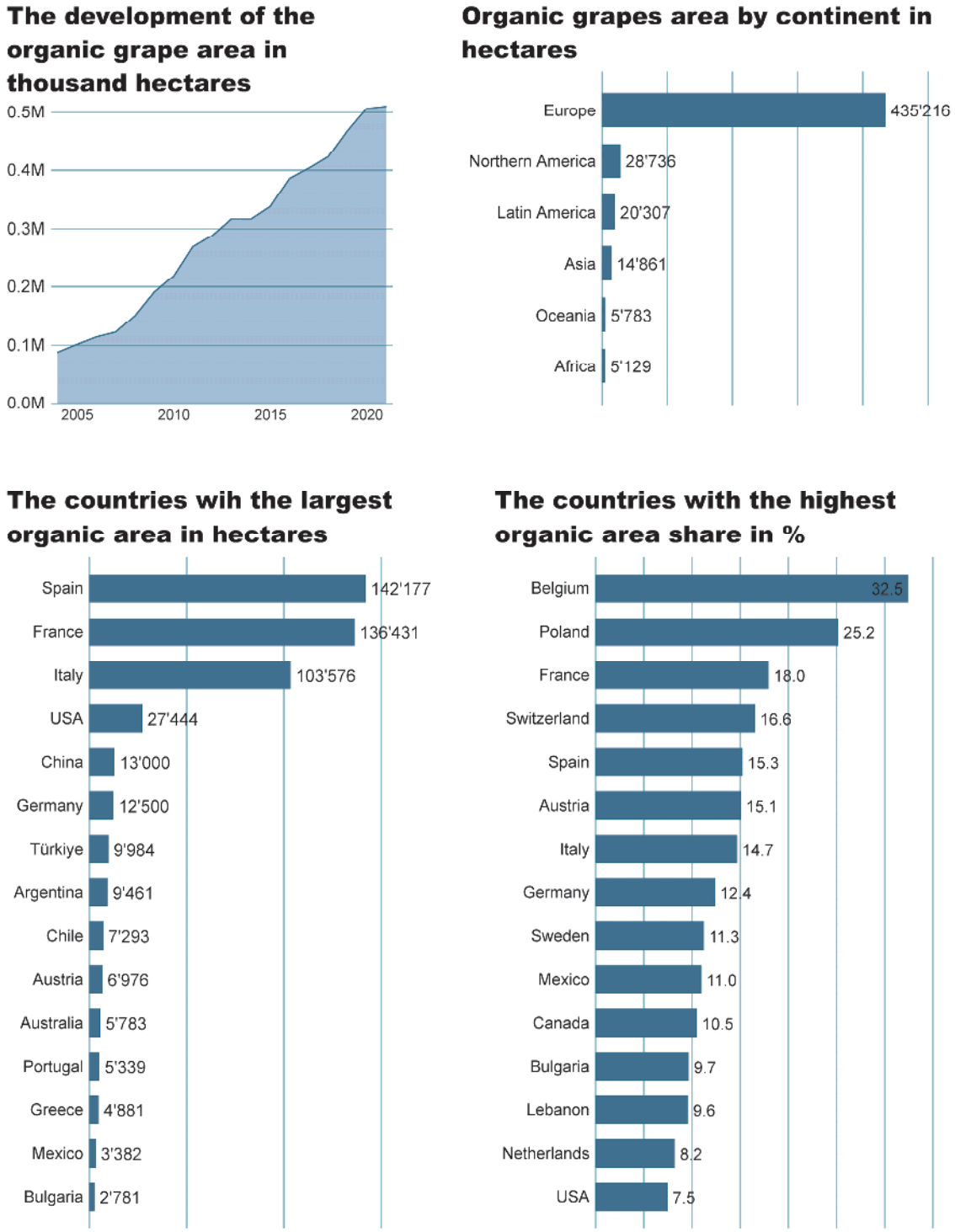


Figure 43: Grapes: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

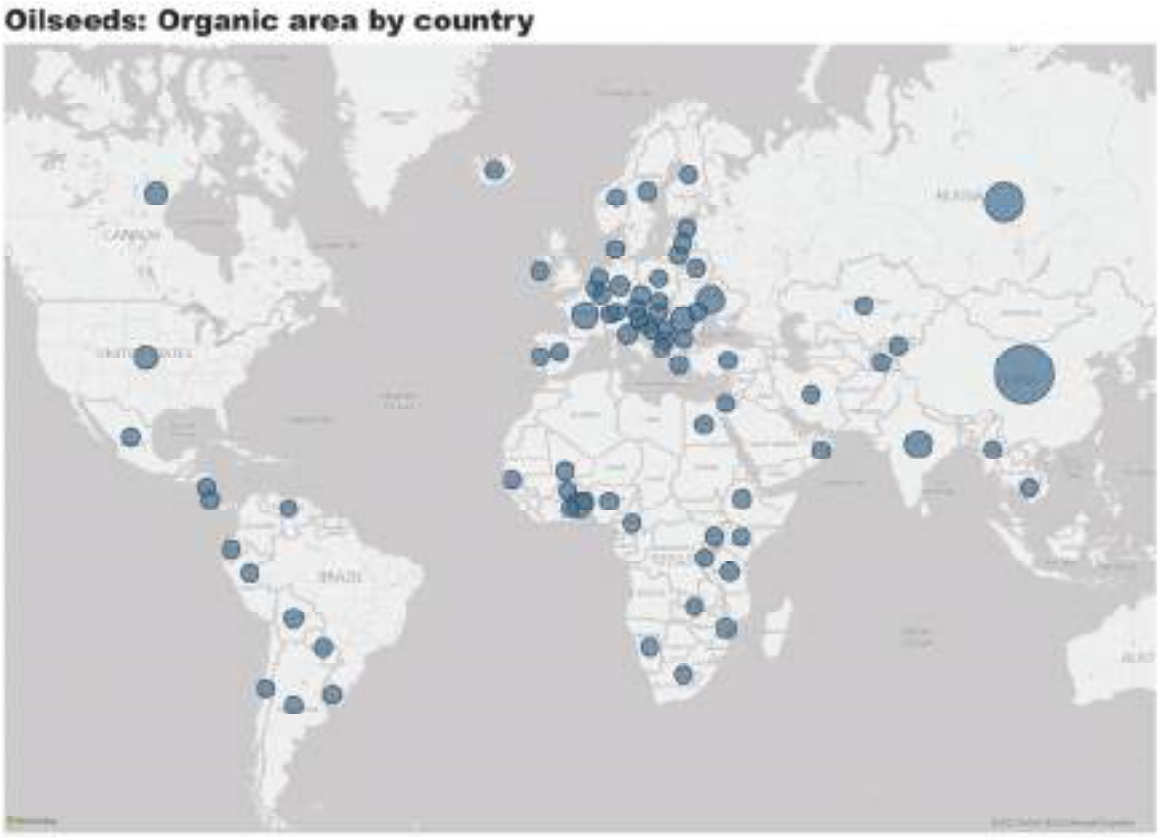
Table 34: Grapes: Organic area by country 2021

Country	Organic area [ha]	Organic area [%]	Area fully converted [ha]	Area under conversion [ha]
Albania	15	0.14	1	14
Algeria	208	0.33	208	
Andorra	2	0.00	2	
Argentina	9'461	4.48	9'461	
Australia	5'783	4.30	888	
Austria	6'976	15.11		
Belgium	159	32.45	59	100
Bulgaria	2'781	9.68	2'781	
Canada	1'292	10.53	1'292	
Chile	7'293	3.61	7'293	
China	13'000	2.24	10'000	3'000
Croatia	926	4.32	926	170
Cyprus	223	3.28	213	10
Czechia	963	5.96	759	203
Denmark	81	0.00	46	35
Egypt	2'157	2.53	2'157	
Estonia	4	0.00	4	
France	136'431	17.97	79'154	57'277
Georgia	777	1.03	491	286
Germany	12'500	12.41		
Greece	4'881	4.68	4'046	835
Hungary	1'955	3.28	1'360	595
Iran	191	0.13	188	3
Israel	71	0.64	70	1
Italy	103'576	14.71	103'576	
Jordan	10	0.33		
Lebanon	656	9.60	652	4
Liechtenstein	4	0.00	4	
Lithuania	7	0.00	5	2
Luxembourg	68	5.51	68	
Malta	7	1.64	7	
Mexico	3'382	11.01	3'382	
Moldova	84	0.07	6	78
Netherlands	14	8.24	12	2
Palestine	0.15	0.00	0.15	
Peru	171	0.48	169	2
Poland	227	25.22	183	44
Portugal	5'339	3.04	4'144	1'195
Rep. of Korea	70	0.52		
Romania	2'401	1.37	1'759	642
Russian Federation	0.1	0.00	0.1	
Serbia	41	0.20	41	
Slovakia	266	1.72	139	128
Slovenia	766	2.54	534	233
South Africa	2'764	2.41	2'041	723
Spain	142'177	15.26	105'035	25'378
Sweden	9	11.25	8	1
Switzerland	2'244	16.58		
Türkiye	9'984	2.46	6'010	3'974
Ukraine	106	0.31	7	99
USA	27'444	7.50	27'444	
Uzbekistan	86	0.08	65	22
World	**510'033**	**7.5**	**376'702**	**95'056**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338
Blank cells: Not data

› Oilseeds

In 2021, almost 2'100'000 hectares or 0.8 percent of the global oilseeds area was under organic management.



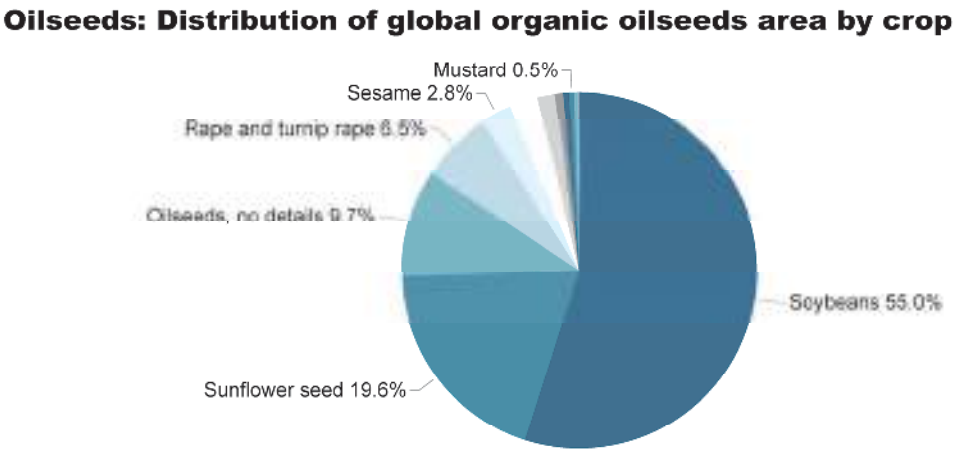


Figure 44: Oilseeds: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

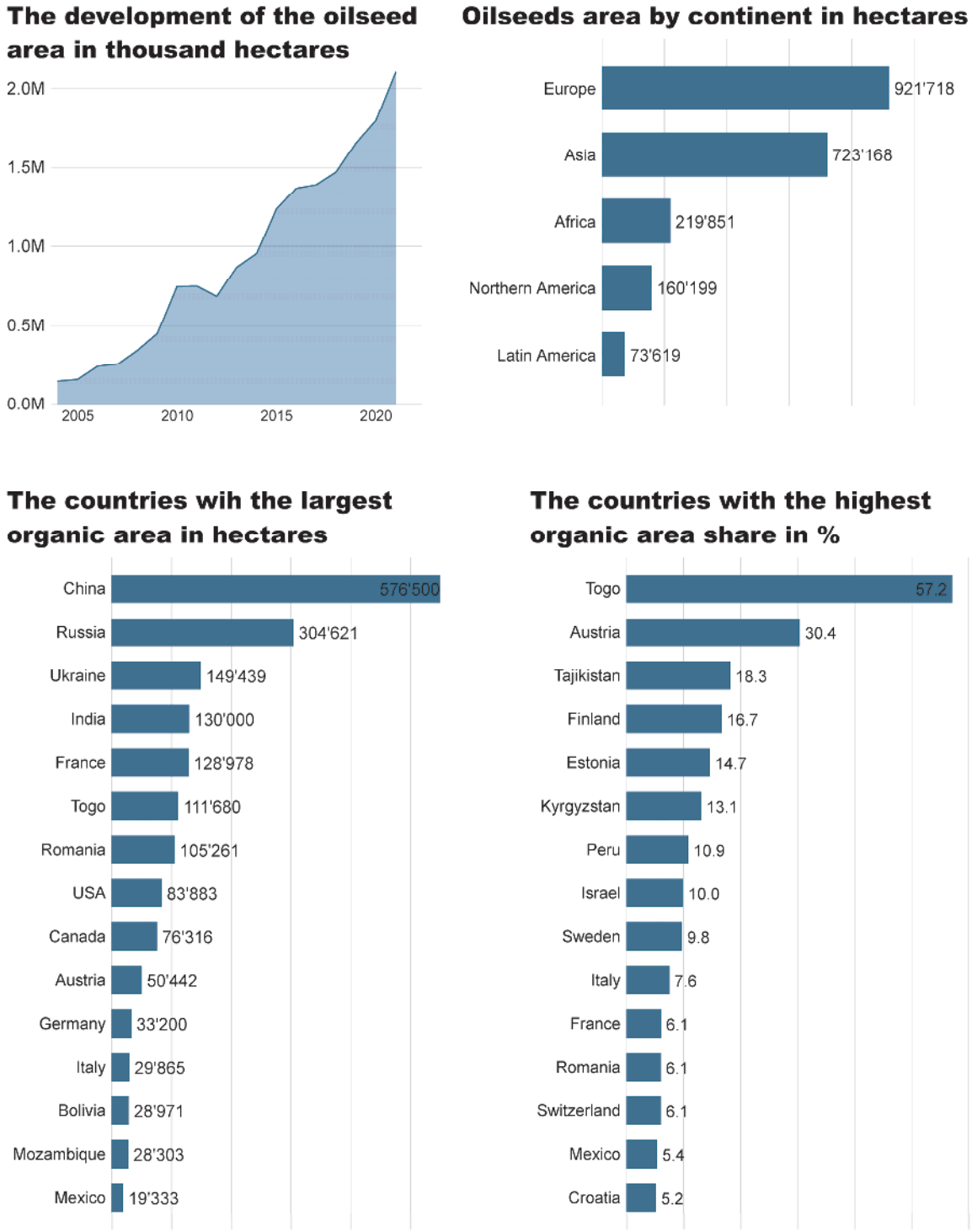


Figure 45: Oilseeds: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 35: Oilseeds: Organic area by country 2021

Country	Organic area [ha]	Organic area [%]	Area fully converted [ha]	Area under conversion [ha]
Albania	1	0.16		1
Argentina	14'105	0.08	14'105	
Austria	50'442	30.43		
Belarus	194	0.05	194	
Belgium	254	3.02	198	56
Benin	9'853	2.37	9'853	0
Bolivia	28'971	1.79	26'513	2'458
Bosnia & Herzegovina	29	0.24	29	
Bulgaria	6'388	0.67	6'388	
Burkina Faso	5'640	0.58	5'640	
Burundi	361	1.84		
Cambodia	1	0.00	1	
Cameroon	2	0.00	2	
Canada	76'316	0.65	76'316	
Chile	2	0.00	2	
China	576'500	2.65	469'900	106'600
Congo D.R.	600	0.08	600	
Costa Rica	6	0.06	6	
Croatia	8'967	5.21	8'967	2'134
Czech Republic	3'498	0.78	2'727	772
Denmark	3'503	2.40	2'305	1'197
Ecuador	404	1.00	283	121
Egypt	1'740	1.50	1'740	
Estonia	11'179	14.68	10'960	219
Ethiopia	16'494	2.21	182	
Finland	4'196	16.72	4'196	
France	128'978	6.08	92'867	36'111
Germany	33'200	3.22		
Ghana	8'282	1.78	8'282	
Greece	3'099	2.92	2'320	778
Hungary	13'365	1.33	12'088	1'277
Iceland	2	0.00	2	
India	130'000	0.45		
Iran	8	0.00	8	
Ireland	71	0.68	59	12
Israel	724	9.95	507	217
Italy	29'865	7.55	29'865	
Kazakhstan	10'408	0.35	9'911	367
Kenya	804	0.50	804	
Kosovo	134	0.00	134	
Kyrgyzstan	2'235	13.13		
Latvia	2'735	1.84	2'558	178
Liechtenstein	24	0.00	24	
Lithuania	13'708	4.63	10'473	3'235
Luxembourg	18	0.63	18	
Mali	12'443	2.22	12'443	
Mexico	19'333	5.39	19'333	
Moldova	7'843	1.75	6'597	1'247
Mozambique	28'303	3.04	28'294	9
Myanmar	576	0.02	576	
Namibia	7	0.71	7	0
Netherlands	104	3.12	103	1
Nicaragua	1'521	2.66	1'189	332
Nigeria	4'817	0.07	4'817	
Norway	124	5.15		

Country	Organic area [ha]	Organic area [%]	Area fully converted [ha]	Area under conversion [ha]
Oman	1	0.00	1	
Paraguay	4'563	0.12	4'513	50
Peru	600	10.86	525	75
Poland	4'752	0.46	2'494	2'259
Portugal	77	0.97	77	
Romania	105'261	6.06	84'130	21'131
Russian Federation	304'621	1.87	51'390	1'540
Senegal	117	0.01	117	
Serbia	2'120	0.44	2'066	54
Slovakia	5'120	1.51	3'746	1'374
Slovenia	364	3.58	321	42
South Africa	3	0.00	3	
Spain	13'400	1.79	10'360	841
Sweden	9'805	9.76	9'566	239
Switzerland	1'943	6.05		
Tajikistan	2'716	18.26	4	33
Tanzania	5'391	0.17	5'391	
Togo	111'680	57.18	111'680	
Türkiye	2'894	0.30	2'352	542
Uganda	10'559	1.13	1'102	
Ukraine	149'439	1.65	129'039	8'631
USA	83'883	0.23	83'883	
Uruguay	2'624	0.25	1'823	801
Venezuela	1'490	1.98	1'490	
Zambia	2'755	0.39	2'220	535
World	**2'098'555**	**0.8**	**1'392'701**	**195'468**

Source: FiBL survey 2023 based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338. Blank cells: no data. For more information on soybean production (organic and other Voluntary Sustainability Standards - VSS), please see the report "The State of Sustainable Markets – Statistics and Emerging Trends 2022."[1]

[1] Willer et al. (Eds.) (2023) The State of Sustainable Markets 2022: Statistics and Emerging Trends. ITC, Geneva Available at: https://vss.fibl.org/.
For interactive online graphics see the Sustainability Map at: https://www.sustainabilitymap.org/trends

› Olives

In 2021, almost 903'000 hectares or 8.6 percent of the global olive area was under organic management.

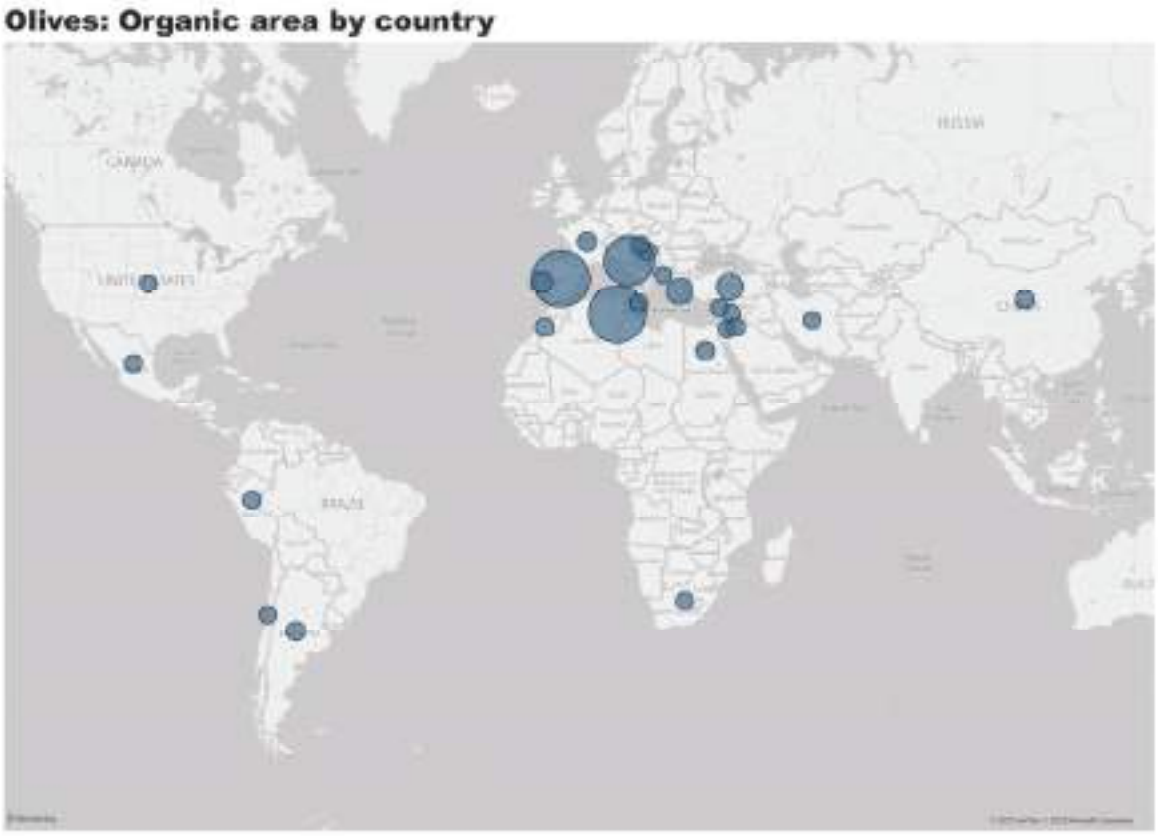


Figure 46: Olives: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

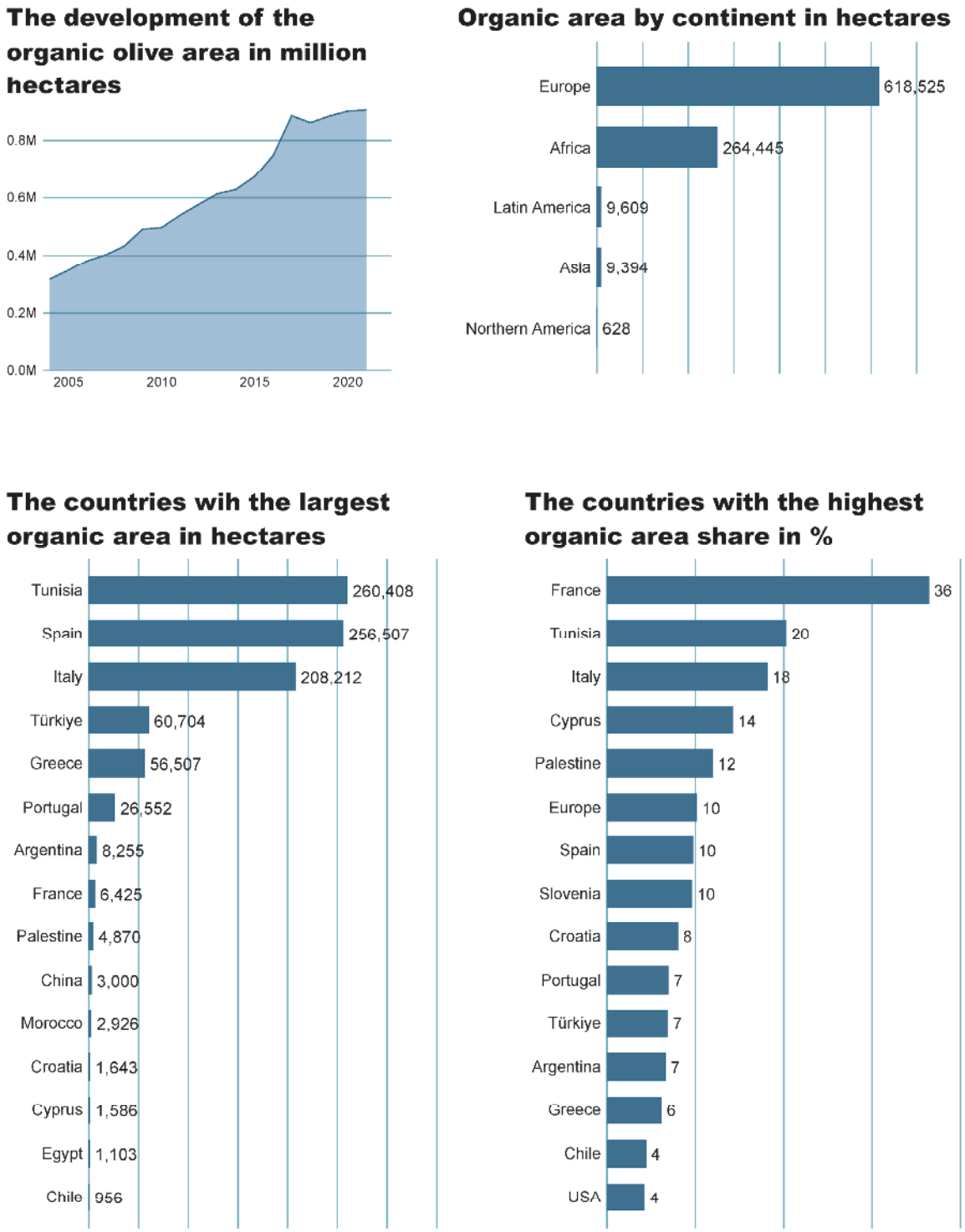


Figure 47: Olives: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 36: Olives: Organic area by country 2021

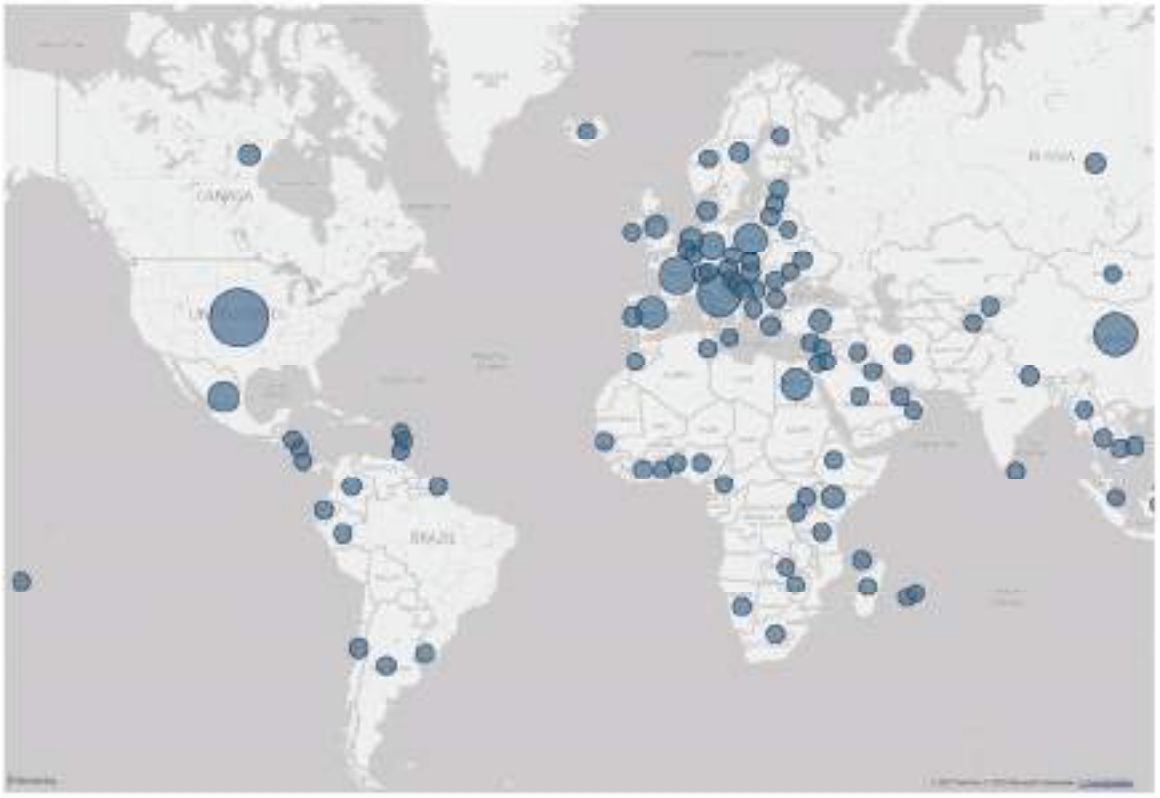
Country	Organic area [ha]	Organic area [%]	Area fully converted [ha]	Area under conversion [ha]
Albania	95	0.19	34	61
Argentina	8'255	6.67	8'255	
Chile	956	4.48	956	
China	3'000	0.00	3'000	
Croatia	1'643	8.10	1'643	433
Cyprus	1'586	14.28	1'462	124
Egypt	1'103	1.11	1'103	
France	6'425	36.47	4'680	1'746
Greece	56'507	6.24	38'828	17'678
Iran	136	0.33	133	3
Israel	766	2.71	745	21
Italy	208'212	18.18	208'212	
Jordan	356	0.60		
Lebanon	266	0.40	251	15
Malta	13	0.00	13	
Mexico	292	3.09	292	
Morocco	2'926	0.26	2'336	590
Palestine	4'870	12.00	4'358	512
Peru	106	0.37	106	
Portugal	26'552	7.00	22'690	3'862
Slovenia	281	9.66	233	48
South Africa	8	0.00	8	
Spain	256'507	9.78	186'830	33'501
Tunisia	260'408	20.33	260'408	
Türkiye	60'704	6.90	42'563	18'140
USA	628	4.31	628	
World	**902'601**	**8.6**	**789'773**	**76'733**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338
Blank cells: No data available.

› Vegetables

In 2021, almost 446'000 hectares or 0.7 percent of the global vegetable area was under organic management.

Vegetables: Organic area by country



Vegetables: Distribution of the global organic vegetable area by crop group

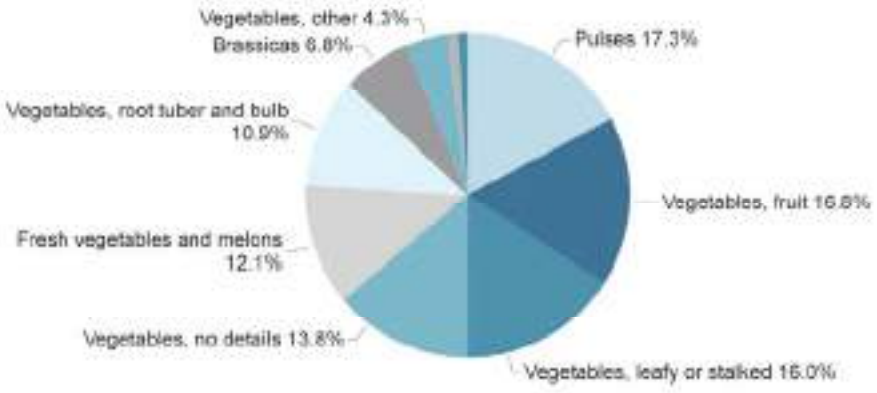


Figure 48: Vegetables: Distribution of organic area by crop group 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

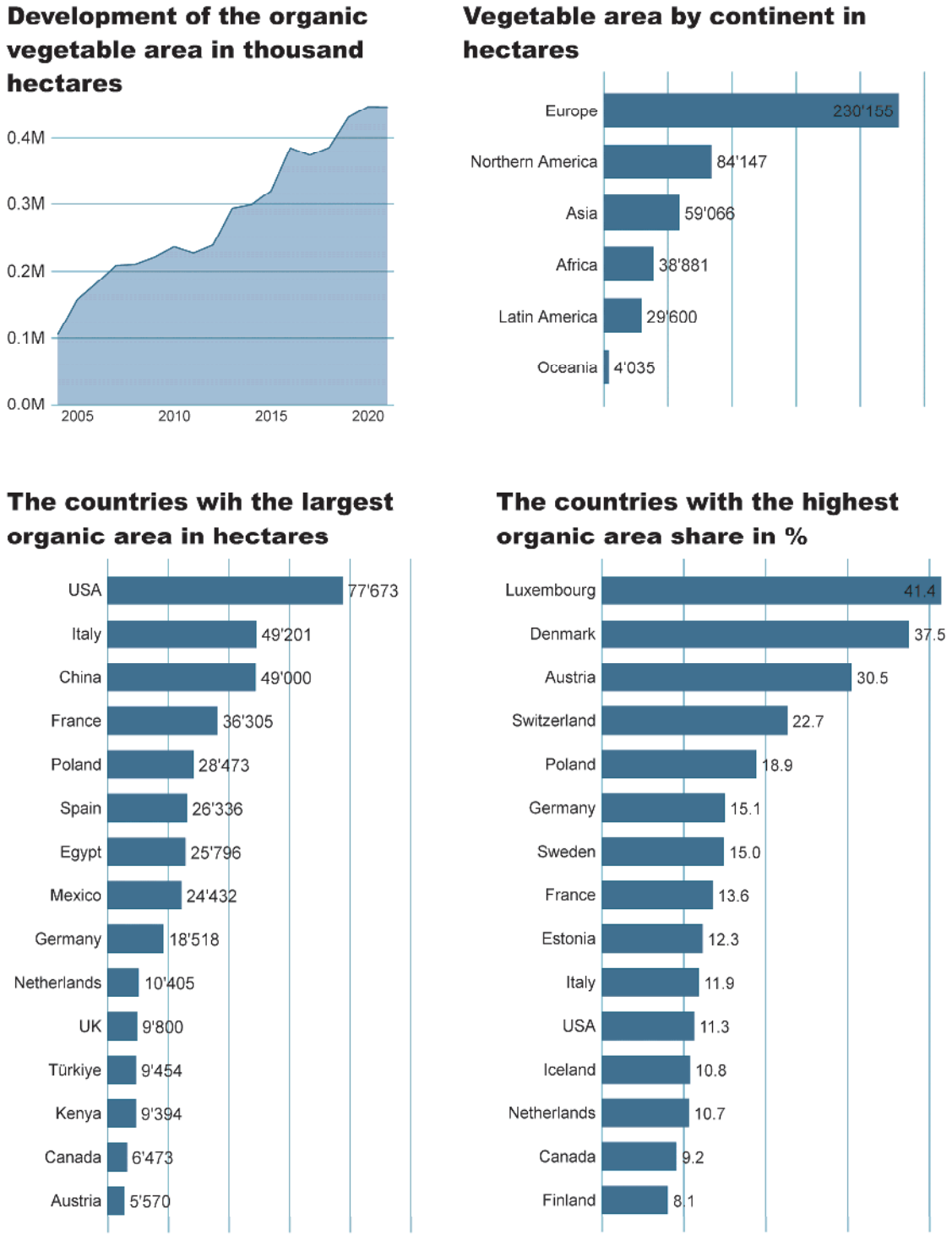


Figure 49: Vegetables: Organic area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

Online at https://statistics.fibl.org/visualisation.html

Table 37: Vegetables: Organic area by country 2021

Country/Territory	Organic area [ha]	Organic area [%]	Area fully converted [ha]	Area under conversion [ha]
Albania	14	0.04	14	0
Argentina	1'694	1.00	1'694	
Australia	3'902	5.57	3'902	
Austria	5'570	30.52		
Belarus	7	0.01	7	
Belgium	3'078	4.48	2'914	165
Benin	5	0.00	5	0
Bosnia and Herzegovina	9	0.01	9	
Bulgaria	1'227	4.82	1'227	
Cambodia	1	0.00	1	
Cameroon	3	0.00	3	
Canada	6'473	9.15	6'473	
Chile	911	1.61	911	
China	49'000	0.20	26'200	22'800
Colombia	780	0.68	780	
Costa Rica	88	0.74	88	
Côte d'Ivoire	1	0.00	1	
Croatia	180	2.13	180	60
Cyprus	69	2.61	47	22
Czech Republic	243	2.12	194	49
Denmark	4'492	37.53	4'308	186
Ecuador	534	0.62	533	1
Egypt	25'796	4.18	25'796	
Estonia	254	12.33	223	31
Ethiopia	14	0.00	14	
Finland	995	8.10	995	
France	36'305	13.55	32'831	3'474
French Guiana (France)	30	0.00	27	3
French Polynesia	25	2.09	25	
Germany	18'518	15.05		
Ghana	0	0.00	0	
Greece	2'866	3.91	1'914	952
Grenada	4	0.31	4	
Guadeloupe (France)	120	0.00	83	37
Honduras	39	0.20	39	0
Hungary	4'372	5.14	3'521	851
Iceland	7	10.78	7	
Indonesia	12	0.00	12	
Iran	23	0.01	23	
Iraq	53	0.03		
Ireland	301	6.73	204	97
Israel	585	0.76	540	45
Italy	49'201	11.89	49'201	
Jordan	16	0.05		
Kenya	9'394	2.32	9'394	
Kuwait	11	0.21	11	
Kyrgyzstan	32	0.03		
Latvia	536	6.46	466	70
Lebanon	47	0.16	47	1
Liechtenstein	9	0.00	9	
Lithuania	421	3.37	246	175
Luxembourg	75	41.44	75	
Madagascar	99	0.16	99	
Malaysia	161	0.23	161	
Malta	4	0.35	4	

Country/Territory	Organic area [ha]	Organic area [%]	Area fully converted [ha]	Area under conversion [ha]
Martinique (France)	83	0.00	70	13
Mauritius	1	0.03	1	
Mayotte	53	0.00	48	6
Mexico	24'432	3.63	24'432	
Moldova	155	0.40	154	0
Mongolia	188	1.72		187
Morocco	605	0.39	589	16
Myanmar	50	0.01	50	
Namibia	7	0.01	7	0
Nepal	216	0.05	109	
Netherlands	10'405	10.65	10'295	110
Nicaragua	457	5.98	457	
Nigeria	50	0.00	50	
Norway	429	5.35		
Oman	2	0.01	2	
Palestine	1	0.01	1	
Peru	417	0.19	87	329
Philippines	10	0.00	10	
Poland	28'473	18.87	23'526	4'947
Portugal	3'991	6.74	3'643	348
Republic of Korea	310	0.13		
Réunion (France)	317	0.00	285	32
Romania	1'042	0.76	713	329
Russian Federation	4'392	0.81	2'466	104
Rwanda	30	0.03	30	
Saudi Arabia	660	0.87	480	180
Senegal	126	0.08	126	
Serbia	106	0.15	97	9
Singapore	15	1.10	15	
Slovakia	799	7.82	499	300
Slovenia	308	3.18	274	35
South Africa	744	0.75	666	78
Spain	26'336	6.91	20'774	1'785
Sri Lanka	121	0.07	121	
Sweden	2'201	14.95	2'174	27
Switzerland	3'214	22.70		
Taiwan	3'742	2.76	3'742	
Tajikistan	23	0.03	19	4
Tanzania	1'075	0.25	1'075	
Thailand	1'829	0.34		
Tonga	108	1.46	108	
Tunisia	201	0.12	201	
Türkiye	9'454	1.03	3'812	5'641
Uganda	318	0.20	216	
Ukraine	299	0.06	270	8
United Arab Emirates	65	0.83	6	58
United Kingdom	9'800	5.75	8'900	1'000
United States of America	77'673	11.30	77'673	
Uruguay	10	0.14	6	4
Viet Nam	1'896	0.16	1'651	244
Zambia	13	0.01	13	
Zimbabwe	29	0.07	29	
World	**445'884**	**0.7**	**365'493**	**44'815**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338338

Organic Cotton

TEXTILE EXCHANGE[1]

Before using the data presented in this chapter, Textile Exchange requests that you please read the scope and disclaimer and data confidence pages of the 2022 Organic Cotton Market Report in which this data was originally published. The data shared are best-available estimates at the time of reporting.[2]

2020/21 global organic cotton production summary

Based on our estimates, the 2020/21 global harvest saw 342'265 tonnes of organic cotton fibre produced on 621'691 hectares of certified organic land, and 180'726 tonnes of in-conversion cotton fibre produced on 293'204 hectares of land in-conversion to organic. Compared to 2019/20, this represents an estimated 37 percent growth in organic cotton fibre.

With overall cotton production reported by the International Cotton Advisory Committee (ICAC) in 2020/21 totalling 24'380'507 tonnes; this means that 1.4 percent of all cotton grown is estimated to have been organic.

The line-up

The total number of countries growing certified organic cotton in 2020/21 remained at 21, but there were some changes in the line-up compared to 2019/20. The projects in Thailand, Myanmar, and Senegal didn't produce any certified organic cotton in 2020/21 due to flooding, political instability, and certification issues. However, two new countries – Spain and Kazakhstan – grew organic cotton for the first time, and Argentina came back into certification.

Countries fuelling the growth

The biggest contributor by far to the global growth seen in 2020/21 was Turkey, followed by Kazakhstan, Tanzania, and India. Together, these four countries accounted for 94.2 percent of the global increase. Other significant contributors, which each saw

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[1] This article draws from the 2022 Organic Cotton Market Report produced by Textile Exchange. Report production: Lisa Barsley and Sophia Opperskalski; Data analytics: Suet Yin Siew, Evonne Tan, Max Tan; Data collection: Amish Gosai (Southern & Southeastern Asia), Sandra Marquardt (Northern America), Silvio Moraes (Latin America & the Caribbean), Ömür Suner (EMENA, Central & Western Asia), Silvère Tovignan, Lazare Yombi, and Leonard Mtama (Sub-Saharan Africa), and Jun Zhao (Eastern Asia). The full 2022 Organic Cotton Market Report is available here: https://textileexchange.org/organic-cotton-market-report/

[2] Before using this data, Textile Exchange requests that you please read the scope and disclaimer (page 5) and data confidence (page 7) of the associated 2022 Organic Cotton Market Report in which this data was originally published. The data shared were best-available estimates at the time of reporting, however, due to significant data gaps for some countries including India, certain data points were based on modelling and assumptions (pages 54-59). The full 2022 Organic Cotton Market Report is available here: https://textileexchange.org/organic-cotton-market-report/

their production totals grow by between 1'000 and 3'000 tonnes, were Tajikistan, China, and Kyrgyzstan. Please read the individual country pages in the full Organic Cotton Market Report to learn more about each country's production trends.

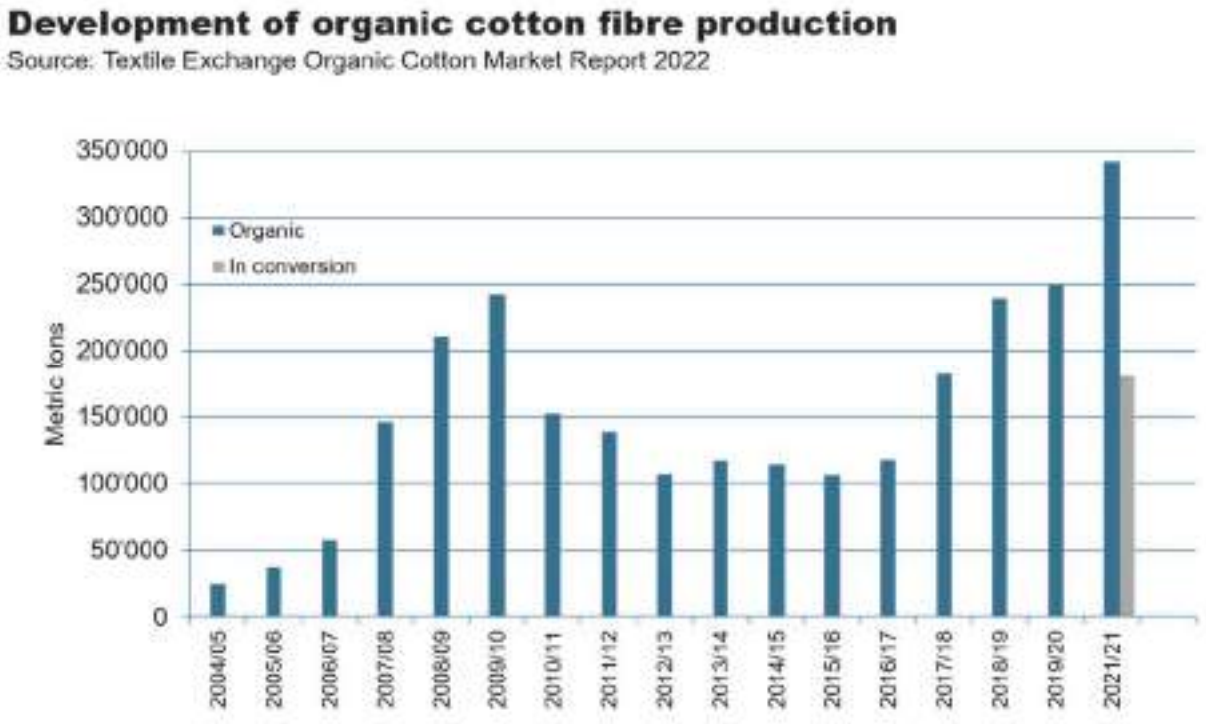


Figure 50: Development of organic cotton fibre production[1]

Source: Textile Exchange

Top producers of organic cotton by volume

An estimated 97 percent of global organic cotton was produced by just eight countries in 2020/21:-India (38 percent), Turkey (24 percent), China (10 percent), Kyrgyzstan (9 percent), Tanzania (6 percent), Kazakhstan (4 percent), Tajikistan (4 percent), and the US (2 percent). The remaining 13 organic cotton-producing countries[2] accounted for 3 percent.

Top producers of in-conversion cotton by volume

In terms of in-conversion cotton, India accounted for the vast majority (86 percent) in 2020/21, while Tajikistan accounted for 7 percent, Turkey for 4 percent, Pakistan for 2 percent, Kyrgyzstan for 1 percent, and eight countries for the remaining 1 percent.

[1] In-conversion cotton was grown prior to 2020/21 but only 2020/21 in-conversion data has been included in this chart.

[2] Includes: Uganda (0.7 percent); Pakistan (0.6 percent); Benin (0.6 percent); Greece (0.5 percent); Peru (0.2 percent); Burkina Faso (0.2 percent); Uzbekistan (0.1 percent); Egypt (0.1 percent); Brazil (0.02 percent); Mali (0.02 percent); Ethiopia (0.02 percent); Spain (0.01 percent); and Argentina (0.001 percent).

Organic Cotton

Global trends and outlook

This is the fifth year in a row that global organic cotton production has increased. The rapid growth in demand for organic cotton has no doubt played a pivotal role in this growth, with prices reaching an all-time high. This encourages both existing organic farmers to grow a higher proportion of cotton, and previously non-organic farmers to convert to organic production methods.

Due to these same trends, we expect to see global organic cotton production rise further in 2021/22.

Regional trends

The EMENA[1], Central & Western Asia region accounted for the biggest share of the global volume growth seen in 2020/21, with production rising 116 percent, primarily a result of considerable growth in Turkey. Sub-Saharan Africa saw the second biggest volume growth, with production rising 44 percent, due primarily to growth in Tanzania. In Eastern Asia (China) production grew 10 percent and in Southern and Southeastern Asia production grew an estimated 5 percent, while Latin America and the Caribbean saw a decline of 9 percent and Northern America (the US) saw a decline of 16 percent. Please read the individual country pages of the full Organic Cotton Market Report to find out the reasons behind these trends.

Further reading

Textile Exchange (2022): Organic Cotton Market Report 2022. The Textile Exchange, Texas. Available at https://textileexchange.org/knowledge-center/reports/organic-cotton-market-report/

Note on Table 38

Before using the data in this table, Textile Exchange requests that you please read the scope and disclaimer (page 5) and data confidence (page 7) of the associated 2022 Organic Cotton Market Report in which this data was originally published. The data shared were best-available estimates at the time of reporting but were based on modeling and assumptions due to significant data gaps. We therefore have a low level of confidence in some of the data. See full report for full details.

The land area figures in this table refer to total land certified to an organic standard by a producer group growing organic cotton. The same piece of land could be used to grow other organic crops as part of a rotation system, a fundamental element of organic agriculture. This means that reported land area figures do not necessarily reflect solely the land area used to grow organic cotton and may, as a result, seem disproportionately high in some cases compared to the organic cotton volumes harvested. The same applies to in-conversion land that may or may not be used to grow organic cotton upon full certification.

[1] EMENA = Europe, Middle East and North Africa

Table 38: Organic and in-conversion land area and fibre production 2020/2021

Source: Textile Exchange Organic Cotton Market Report 2022

		---------- Land area ----------			---------- Cotton fibre ----------		
Country	**Region**	**Organic and in-conversion land (hectares)**	**Organic certified land (hectares)**	**In-conversion land (hectares)**	**Organic and in-conversion cotton fibre (tonnes)**	**Organic cotton fibre (tonnes)**	**In-conversion cotton fibre (tonnes)**
Argentina	Latin America & the Caribbean	5	5	-	2	2	-
Benin	Sub-Saharan Africa	8'973	8'199	774	2'132	1'893	239
Brazil	Latin America & the Caribbean	14'848	14'591	257	99	70	28
Burkina Faso	Sub-Saharan Africa	4'035	4'035	-	647	647	-
China	Eastern Asia	15'904	15'727	178	33'911	33'687	225
Egypt	EMENA, Central & Western Asia	404	404	-	437	437	-
Ethiopia	Sub-Saharan Africa	174	174	-	60	60	-
Greece	EMENA, Central & Western Asia	3'370	2'284	1'087	2'696	1'827	869
India	Southern & Southeastern Asia	499'213	230'125	269'089	283'853	130'849	153'004
Kazakhstan	EMENA, Central & Western Asia	8'865	8'865	-	14'893	14'893	-
Kyrgyzstan	EMENA, Central & Western Asia	24'307	21'423	2'883	32'401	30'945	1'456
Mali	Sub-Saharan Africa	1'486	1'486	-	63	63	-
Pakistan	Southern & Southeastern Asia	8'922	3'098	5'824	5'541	1'925	3'617
Peru	Latin America & the Caribbean	1'445	1'086	359	876	694	182
Spain	EMENA, Central & Western Asia	62	54	8	30	26	4
Tajikistan	EMENA, Central & Western Asia	17'795	9'806	7'990	25'501	13'648	11'852
Tanzania	Sub-Saharan Africa	235'992	235'992	-	20'932	20'932	-
Turkey	EMENA, Central & Western Asia	47'864	43'329	4'535	89'818	80'830	8'988
Uganda	Sub-Saharan Africa	7'940	7'940	-	2'551	2'551	-
United States	Northern America	12'154	12'035	118	5'878	5'821	57
Uzbekistan	EMENA, Central & Western Asia	1'138	1'035	103	670	465	205
Global total	**Global total**	**914'896**	**621'691**	**293'204**	**522'991**	**342'265**	**180'726**

Source: Textile Exchange Organic Cotton Market Report 2022

Organic Palm Oil

THOMAS BERNET[1] & PAUL VAN DEN BERGE[2]

The image problem of palm oil impacting organic development

In the last 20 years, global palm oil production has drastically increased. Although the oil palm is native to the African continent, it has seen far-reaching expansion, especially in Asia, with Indonesia and Malaysia producing more than 80 percent of all palm oil produced today. This fast expansion has been triggered mainly by big companies establishing high-yielding input intensive monocultures in place, leading to a situation where palm oil has become the cheapest vegetable oil available on the world market. Yet, the expansion of oil palm monocultures has gone hand in hand with deforestation, biodiversity losses, land tenure conflicts, and, in many cases, negative social impacts. This has led to a critical view on palm oil among civil society organisations and consumers and fuelled the development of specific certification schemes for palm oil production. RSPO[3] (Roundtable on Sustainable Palm Oil) certification has become the most relevant standard, with almost five million hectares being RSPO certified worldwide.

Especially in countries with higher income levels, NGOs and media have been key in making consumers aware of the downsides of conventionally produced palm oil. Overall, this negative image of palm oil among consumers has impacted the sourcing strategies of retailers and food manufacturers. Many food processing companies, where economically and technically feasible, have developed new formulas and processing steps for their products to replace palm oil with other oils and fats — while communicating this quite assertively with the claim 'without palm oil' to consumers. At the same time, to not lose credibility among consumers, especially retailers targeting upscale markets saw themselves somehow obliged to develop an explicit and proper palm oil vision or strategy. For instance, Coop supermarkets in Switzerland issued in 2018 its own "Coop Vision for Palm Oil", implying that all its (conventional) own-label food brands would either use organic (Bio Suisse[4])-certified palm oil or completely abandon palm oil as an ingredient. This strategy was actively communicated as part of

[1] Dr Thomas Bernet, Group "Value Chains & Markets", Department of International Cooperation, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org.
[2] Paul van den Berge, Group "Value Chains & Markets", Department of International Cooperation, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org.
[3] Website of the Round Table on Sustainable Palm Oil - RSPO: https://rspo.org/
[4] Bio Suisse is the organic umbrella organisation in Switzerland. A total of 7'500 organic producers and organic growers are members of Bio Suisse. In addition, more than 2'300 operations and producer groups worldwide are certified according to the Bio Suisse standards. Their products appear on store shelves under the Bio Suisse Organic label. For more information, see www.biosuisse.ch.

the retailer's sustainability campaign "Actions not Words"[1] and led to a Bio Suisse, organic and RSPO-certified smallholder-based palm oil sourcing project in Côte d'Ivoire to cover its demand for organic palm oil for certain food categories. Thereby, the project aims to optimise sustainability aspects with best practices that go beyond organic certification criteria (e.g., biochar-enhanced compost recycling of all waste products from the palm oil mill, effective use of cover crops, and diversification of monocultures).

As a means to ensure that organic palm oil production effectively contributes to sustainability, different label organisations have also reviewed their certification criteria and procedures in recent years. For instance, Bio Suisse has issued new, stricter palm oil certification criteria, making RSPO or an equivalent certification scheme (e.g., "Fair for Life") compulsory to better cover relevant social aspects. Additionally, other criteria were introduced to promote smallholder empowerment, improved organic fertilisation and measures to enhance production system biodiversity. The decision-making process within Bio Suisse was inspired by a FiBL study assessing the sustainability impact of organic versus various conventional palm oil production schemes (Bernet and van den Berge 2019).

Demand for organic palm oil mainly by the food industry

While conventional palm oil, for its low cost, is also widely used as an ingredient for different non-food industries (e.g., detergents, cosmetics, biofuel), organic palm oil is primarily used in the food industry producing organically certified consumer products. Especially palm stearin (the solid palm oil fraction) is strongly demanded. Due to its odour-free nature, palm stearin has a wide variety of applications, such as margarine, pastries, dairy products, confectionery products and others. Depending on the application, it can also be functionally mixed with liquid palm oil fractions to obtain the required consistency, e.g., for spreads or creams. This applies to both food and cosmetic products.

Compared to other vegetable fats and oils, organic palm oil is a convenient ingredient for the food industry, being relatively inexpensive and versatile. Thus, it is rather the scepticism of consumers towards this ingredient—or the pressure from traders or retailers to offer only palm oil-free products—that leads to the use of competing oils and fats where feasible. The downside of this substitution is that alternative oils and fats are more expensive and require the area to grow (Batlogg and Bernet 2018).

Market and trade situation

Besides the general image problem of palm oil, price is a relevant factor in the market demand for organic palm oil. In this regard, producing countries of organic palm oil compete at the level of production costs, whereby the cost level for importers mainly relates to two aspects: the purchasing price of the organic palm oil, mainly defined by

[1] "Sustainable palm oil" at the Coop website "Action, not words". For more information, see https://www.actions-not-words.ch/en/sustainability-topics/agriculture-and-processing/raw-materials/palm-oil.html

the production costs involved, and import tariffs. Production costs are very much context-specific, greatly depending on the operational setup of the oil mill and the quality of the involved plantations and outgrower schemes, plus the practices to ensure good production of oil palm fruits and the logistical services to guarantee their timely collection and processing. All in all, high processing volumes, high extraction rates, good year-round use of the mill's capacity and good oil palm yields are all factors that favour low production costs. In contrast, import tariffs are country specific. As importing countries tend to protect their own industries, fairly high import tariffs apply for palm oil, except for those countries that benefit from the Least Development Country (LDC) status or those with bilateral trade agreements, where no import duties apply.

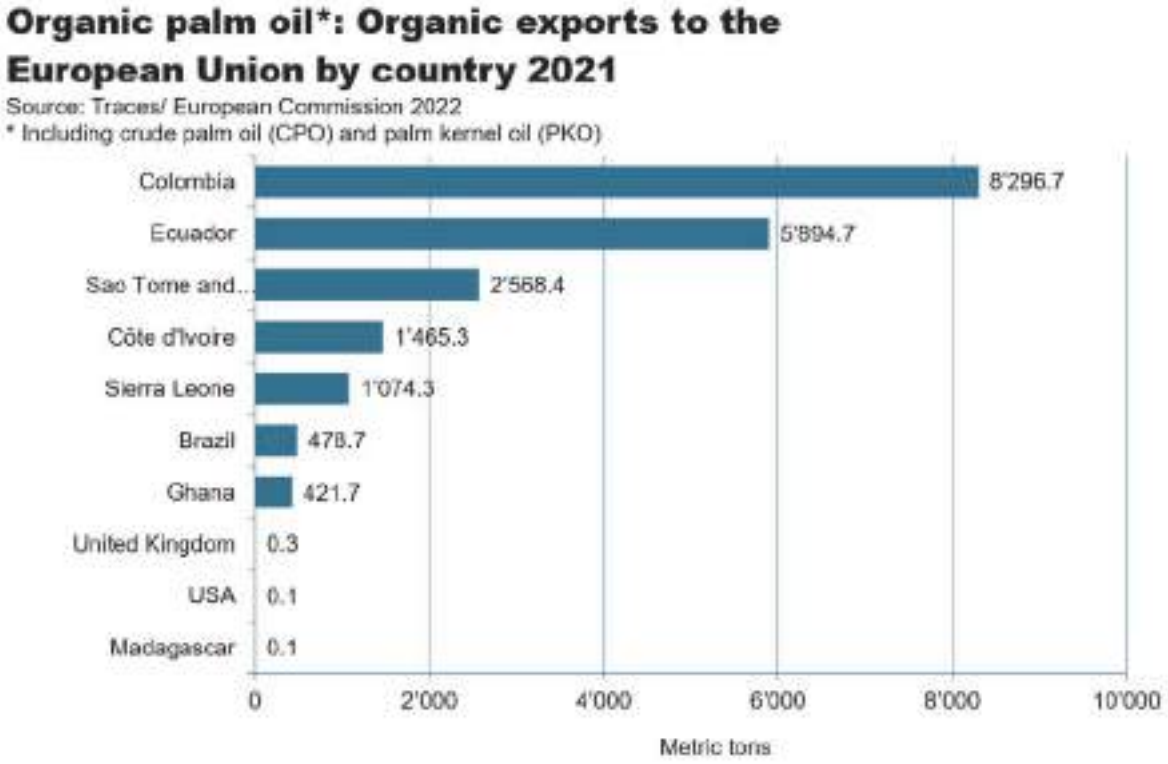


Figure 51: Organic palm oil exports to the European Union

Source: European Commission/Traces 2022

In fact, the LDC status is a critical competitiveness factor and explains why, for instance, Côte d'Ivoire, Sao Tome and Principe, Sierra Leone, and Madagascar have become organic palm oil producing and exporting countries (Figure 51). They compete with countries that have a more developed palm oil sector, i.e., Colombia, Brazil and Ecuador, with higher hectare yields and better infrastructure and thus lower unit costs, but where importers face import taxes. Ghana is a special case; the private sector investments among social entrepreneurs laid the basis for the production and export of double-certified organic and "Fair for Life" palm oil originating exclusively from smallholder production schemes.

Market development trend and outlook

The European Union's export statistics for recent years show that export volumes of organic palm oil did not change much over the period 2018-2021 (Figure 52). It seems that, on the one hand, the growing number of processed organic food products increases demand; however, on the other hand, demand is partly reduced as palm oil tends to be substituted with other vegetable oils in different food categories.

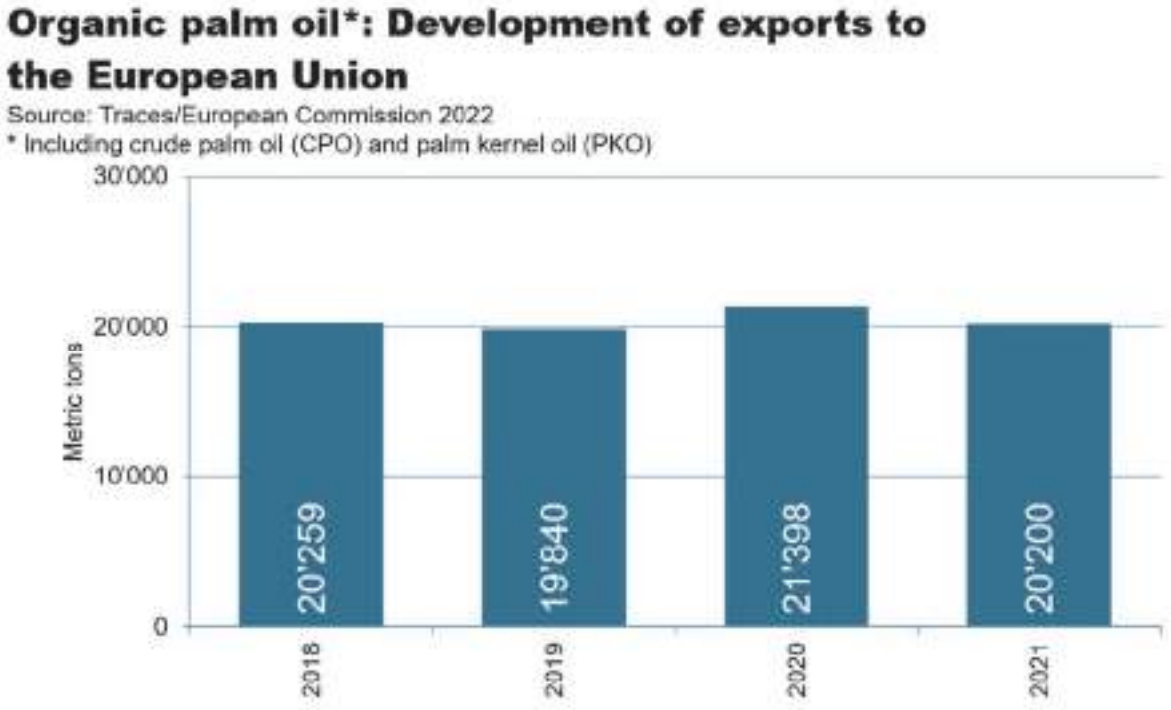


Figure 52: Organic palm oil exports to the European Union

Source: European Commission/Traces 2022

As a continuous expansion of conventional palm oil is expected at the global level, targeting especially countries with lower incomes, the "palm oil debate" is likely to continue, and consequently, the discussions and efforts to promote and ensure the production of "truly sustainable" palm oil. In countries where this debate is more advanced, consumers will be increasingly aware that private organic standards help ensure that palm oil is produced in contexts and ways that are favourable for having positive environmental and social impacts. This increased consumer awareness is likely to put additional pressure on both certification bodies and the private sector, especially retail, to increasingly ensure that the palm oil certified and used guarantees sustainability.

Moreover, driven by the interest in this topic, we must expect that both media and research will remain very active in fuelling this debate with scientific and consumer-oriented articles — even more so as biodiversity, climate change and deforestation will remain key concerns for all: consumers, policymakers and the private sector. As these topics will also more strongly influence the palm oil debate, we anticipate interesting new investments and innovations in the field of agroforestry, aiming to diversify palm

oil plantations with other plant species to diversify the production system and thus enhance biodiversity and CO_2 sequestration.

Regarding consumer and private-sector demands to ensure that organic palm oil production is sustainable, well-established partnerships and joint investments between palm oil producers and importers are likely to become more important. Especially in ventures involving a high number of smallholders, a strong local partner running the oil mill and engaging with smallholders will be a critical success factor for organic palm oil production.

To what extent the market for organic palm oil will expand is difficult to anticipate. As the negative implications of conventional palm oil production are obvious and remain valid in the coming years, the negative image of palm oil will continue hampering the growth in demand for organic palm oil. Here, bigger supermarket chains' position and communication efforts towards using organic palm oil in manufactured food products will strongly impact demand (see the example of Coop Switzerland). At the same time, the volume of organic palm oil is likely to increase as conventional palm oil producers are increasingly under price pressure and may shift towards organic cultivation to fetch higher market prices. Yet, the success of such ventures will depend on having the buyers committed to engaging in such new business partnerships.

Acknowledgement

This article was elaborated in the framework of the two projects "Organic Palm Oil from Africa – Bio Suisse certified palm oil from small-scale farmers in Ivory Coast" and "Climate friendly organic palm and coconut oil production in the tropics" being implemented by FiBL Switzerland in collaboration with a strong local partner. Both projects are funded by Coop Switzerland.

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Global Market and EU Organic Imports

The Global Market for Organic Food & Drink

Amarjit Sahota[1]

* This chapter has been prepared by Ecovia Intelligence (formerly known as Organic Monitor) from its ongoing research on the Global Market for Organic Food & Drink. No part of this chapter may be reproduced or used in other commercial publications without written consent from Ecovia Intelligence.[2]

1 Introduction

Growth in the global market for organic food & drink slowed in 2021. After reporting record growth (17 billion US dollars[3]) in 2020, growth slowed to just 5 percent in 2021; market revenues expanded by 6.4 billion to 135.5 billion US dollars[4] (Figure 53).[5]

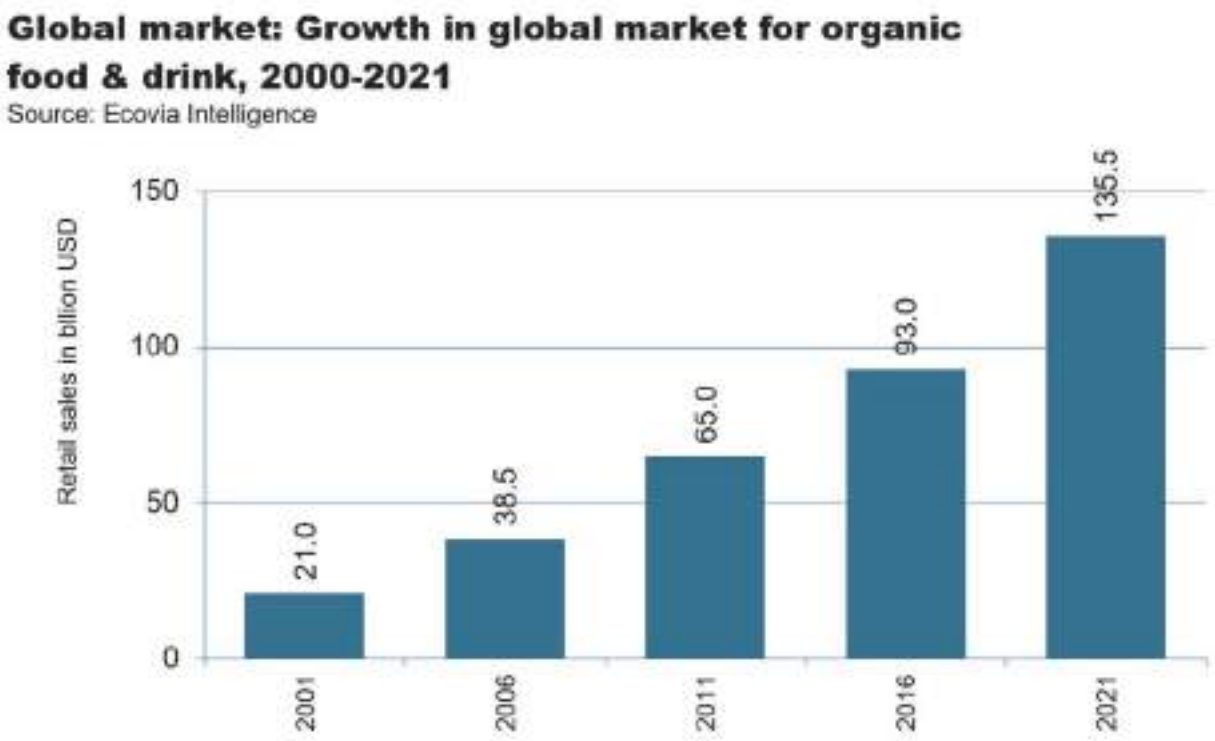


Figure 53: Growth in Global Market for Organic Food & Drink, 2001-2021

Source: Ecovia Intelligence

[1] Amarjit Sahota is the Founder of Ecovia Intelligence (formerly Organic Monitor). Since 2001, our organisation has been tracking the global organic & related product industries. More details are on www.ecoviaint.com

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[3] In 2021, 1.1827 US dollars corresponded to 1 euro.

[4] Approximately 115 billion euros, using the exchange rate of the Central European Bank for 2021.

[5] Please note that there are some differences in organic food sales between the calculations of Ecovia Intelligence and those of FiBL due to different methodologies.

Market growth rates slowed as consumer buying habits returned to pre-pandemic levels. The exceptionally high growth in 2020 was because of COVID-19 elevating consumer interest in health & wellness issues. Organic foods were sought after as consumers focused on disease avoidance and building personal immunity. Demand for organic foods surged after the pandemic began in the spring of 2020.

Slower growth occurred in 2021, and there is expected to be lower growth in 2022. Market conditions changed considerably this year. The Ukrainian conflict has led to food inflation and weakening economic conditions, especially in Europe. This is having a negative impact on the organic food market.

2. Global market overview

The international market for organic food & drink expanded by 5 percent to 135.5 billion US dollars in 2021. Market growth rates slowed in all geographic regions this year as consumer demand stabilised after a spike in 2020.

Figure 53 shows historic growth in the global organic products market. The market was worth only a few billion dollars in the 1990s and reached 21 billion US dollars in 2001. Revenues surpassed the 100 billion US dollar mark in 2018. Within three years, the market size had reached 135 billion US dollars.

North America and Europe comprise most sales, with a combined 90 percent share. Most growth, however, is coming from other regions, especially Asia. Organic food markets are becoming important in countries such as China, India, and South Korea.

3. Major Trends

After two years of the coronavirus pandemic, 2022 brought more disruption. The Ukrainian conflict is having an adverse impact on the organic food market; it has increased inflation, slower economic growth, rising food prices and raised food security concerns.

Rising food prices

According to the FAO (United Nations), global food prices have surged 65 percent since the start of the pandemic. The Ukrainian conflict has negatively affected food supply chains, as well as raising fertiliser prices and energy prices. Ukraine and Russia are two of the world's leading exporters of wheat, corn, barley and sunflower oil. Combined, they supplied 75 percent of global exports of sunflower oil and 30 percent of wheat.

Food prices increased by about 12 percent in 2022, having a negative effect on the organic food sales. Rising food prices have made consumers more price sensitive; demand for premium products, including organic foods, has been negatively affected in Europe.

Food security

Inflation, especially rising food prices, are raising food security concerns. Many countries are introducing protectionism measures as they look to improve food security. For example, Indonesia introduced a temporary ban on palm oil exports in April 2022.

High food prices and food insecurity discourage many producers from converting to organic farming methods. There is no incentive for farmers to convert if they already get a high premium for conventional food products. Some governments are also encouraging intensive farming methods as they look to raise output to feed their populations.

Retailing trends

In Europe, conventional supermarkets are rationalising their organic product ranges. Weakening economic conditions and inflationary pressure are making retailers reduce premium product ranges. Many supermarkets in countries like France and the UK are reducing their organic assortments.

Low-cost retailers, such as discounters, are benefiting the most in the current retail environment. Consumers are trading down, buying more products from discount stores. Organic food sales are increasing from discounters in many countries.

Regulatory support

In the current economic climate, there is a greater need for regulatory support. Slowing market growth rates and rising food prices are barriers to increasing organic food production levels. For instance, the European Union has set a target of 25 percent organic agriculture by 2030. In 2021, the share was just 9.6 percent. The European market for organic products increased by just 3 percent in 2021; slower growth is envisaged in 2022. If consumer demand for organic foods remains subdued, farmers will need financial incentives to convert to organic practices.

The same is true for producers in other regions, especially North America, where there are just 2 million hectares of organic farmland.

Conclusions

Geopolitical conflicts and rising food prices are having a negative impact on the global organic food market. After reporting record sales in 2020, market growth slowed to just 5 percent in 2021. Lower growth is projected in 2022 as consumer demand weakens; inflation, especially high food prices, and food security concerns are affecting demand for organic foods. The European market has been the most adversely affected.

Imports of Organic Agri-food Products into the European Union

Summary of the EU Agricultural Market Brief on EU Organic Imports 2021[1]

This article is a summary of the European's Commission's Agricultural market brief "EU imports of organic agri-food products - Key developments in 2021" published by the European Commission, DG Agriculture and Rural Development. It provides data on EU imports of organic agri-food products in 2021 and highlights key developments compared to 2020. Data on import volumes of organic products come from the Commission's online management tool TRACES (TRAde Control and Expert System). The import data are summarised in terms of origin and destination, as well as in product classes and categories. Finally, since the EU-UK Trade and Cooperation Agreement (EU-UK TCA) was applied provisionally as of 1 January 2021, imports from the UK are accounted for only in 2021.

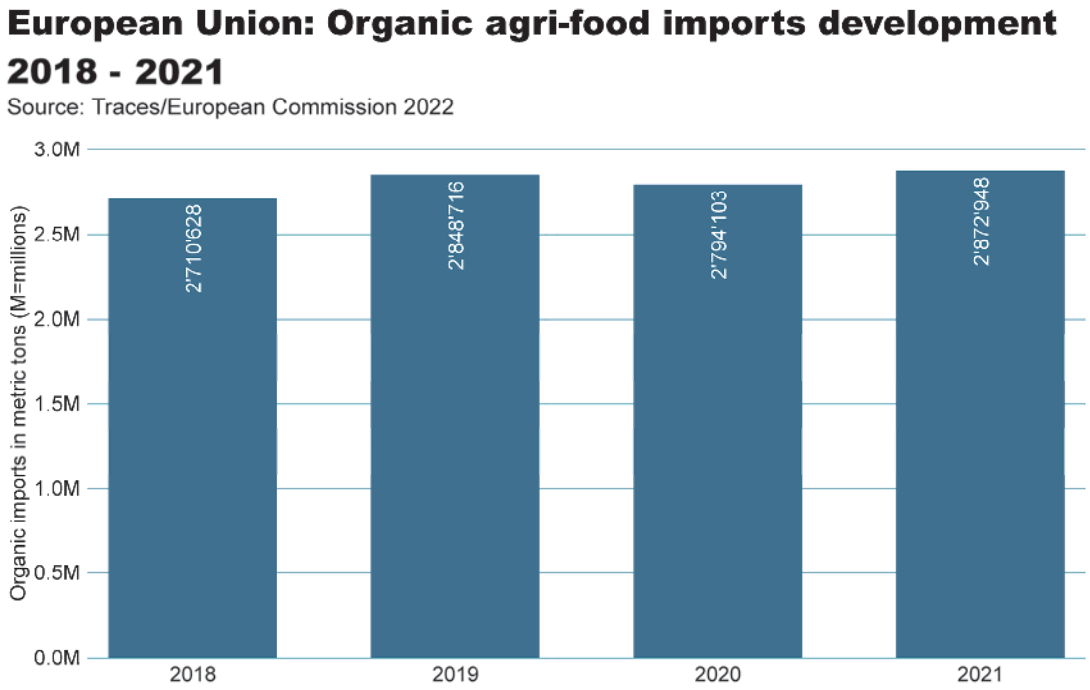


Figure 54: EU organic imports 2018-2021

Source: European Commission/TRACES 2022. Graph: FiBL

[1] European Commission (2022): EU imports of organic agri-food products. Key developments in 2021. EU Agricultural Market Briefs No 19, September 2022, available at https://ec.europa.eu/info/food-farming-fisheries/farming/facts-and-figures/performance-agricultural-policy/studies-and-reports/market-analyses-and-briefs_en#marketbriefs.

EU Organic Imports

Organic imports volumes up by 2.8 percent in 2021

- Total imports of organic agri-food products in the EU have increased from 2.79 million metric tons in 2020 to 2.87 million metric tons in 2021 (+2.8 percent).
- Data on imports from the UK are, however, not available for 2020 as it was de facto an EU Member State during the transition period following its departure from the EU on 31 January 2020. Excluding imports from the UK in 2021, EU imports of organic products declined by 1 percent compared to 2020, to 2.76 million metric tons.

Commodities[1] still top organic imports, but their share is shrinking

- The EU remains a major importer of organic agri-food products, essentially products that have undergone no or very little transformation.
- The main imports in terms of volume were highly standardised products mostly traded in bulk such as cereals, cocoa beans, coffee (commodities) as well as fruit and vegetables and meat (other primary products). Commodities and other primary products each accounted for 44 percent of total organic imports (Table 39, Table 40, Table 41. Table 42, Table 43, Figure 55, Figure 56).
- Imports of commodities in terms of volume, however, have decreased by 5.3 percent to 1.27 million metric tons, mainly due to a trend of diminishing supply of oilcakes from China, wheat from Ukraine and sugar from Brazil and India.
- On the other hand, imports of other primary products in terms of volume have increased by 5.7 percent to 1.25 million metric tons, mainly due to growth in the demand for tropical fruit, and in particular bananas.
- Imports of tropical fruit – the largest product group – have increased by 7.0 percent to 903'000 metric tons, of which imports of bananas were up by 6.2 percent to 721'000 metric tons.
- Imports of higher value products were significantly smaller, but nevertheless have shown high growth rates: imports of processed products (mainly juices, olive oil) have increased by 7.0 percent to 212'000 metric tons. Imports of food preparations and beverages more than doubled (+120 percent each) to 98'000 and 3'700 metric tons respectively.

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[1] The EU organic import data are grouped according to the following classes:

- «*Commodities*» includes, among others: cereals, vegetable oils and oilseeds, sugars, milk powders and butter, unroasted coffee and cocoa.
- "Other primary" includes: meat products, F&V, milk yoghurt and honey.
- "Processed" includes: cheese, meat preparations, wine and fruit juices. "Food preparations" includes: infant food, confectionary and pasta.
- "Beverages" includes: beers, spirits and soft drinks.
- "Non-edible" covers: plants and essential oils. Moreover, in its scope, the organic regulation covers also products of the fishery sector, which are reported under "Fish and non-agri".

More details: https://ec.europa.eu/info/sites/default/files/food-farming-fisheries/farming/documents/agrifood-explanatory-note_en.pdf

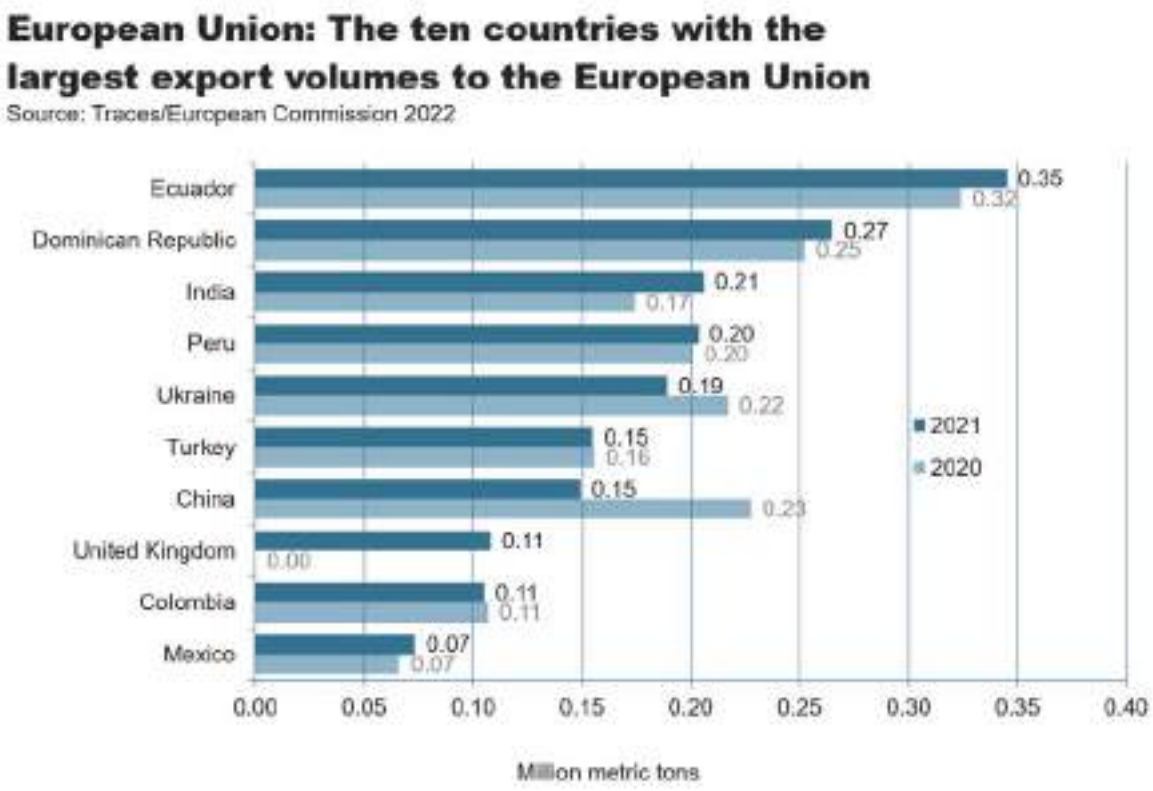


Figure 55: EU organic imports by country of origin 2021

Source: European Commission/TRACES 2022. Graph: FiBL

A quarter of imported olive oil was organic

– Out of 186'000 metric tons of olive oil imported into the EU in 2021, 45'000 or 24.0 percent was organic and coming almost exclusively from Tunisia, up from 16.3 percent in 2020. The significant increase in share is the result of organic olive oil showing a much smaller annual decline in imports (-5.6 percent) compared to non-organic olive oil (-35.8 percent).
– Among the other products with a significant – and increasing – organic share in 2021 were tropical fruit (10.2 percent) and honey (7.9 percent). On the other hand, organic import shares for sugar (8.6 percent) and cocoa beans (4.5 percent) decreased. (Table 44, Table 45).

Exporters of tropical fruit top the list of main origins

– The principal exporters of organic bananas – Ecuador and the Dominican Republic – are at the top of the exporters of organic products to the EU. Exports from these countries have increased by, respectively, 6.5 percent and 5.1 percent from 2020 to 2021 (Table 44, Figure 56).

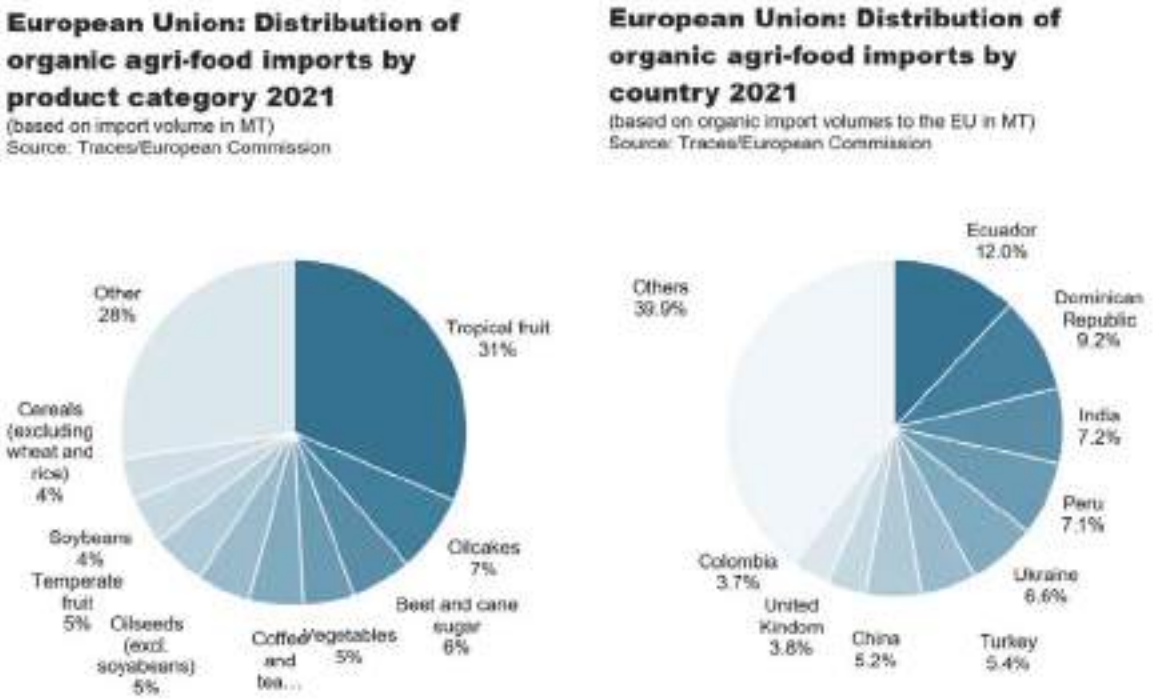


Figure 56: Distribution of EU organic imports by product group and country of origin 2021

Source: European Commission/TRACES 2022; Figure: FiBL

- Since the application of the EU-UK TCA as of 1 January 2021, the United Kingdom became the 8th main exporter of organic products to the EU (in volume), with 108'000 metric tons. Organic imports from the UK cover a rather unique list of products, ranging from dairy (100 percent of EU organic dairy imports) to pet food (98 percent), beer (100 percent), poultry meat (100 percent), sheep and goat meat (81 percent) and pig meat (62 percent).
- Out of the main origin countries, 2021 imports from India grew fastest (+18.1 percent, mainly in oilcakes), followed by Mexico (+10.8 percent, mainly juices and sugar products). On the other hand, imports from China (-34.4 percent, oilcakes), and Ukraine (-12.9 percent, wheat) decreased.

Over 50 percent of imports coming to the Netherlands and Germany

A third (945'000 metric tons) of total EU imports of organic products arrived in the Netherlands (+10.2 percent vs 2020) and almost 20 percent (517'000 t) in Germany (+5.2 percent). Together, these two EU Member states gathered over half of the EU volume of imported organic products in 2021.

The other top five importers, however, recorded declines. Belgium organic imports decreased by 8.6 percent to 277'000 metric tons (less wheat and sugar), France by 1.1 percent to 272'000 metric tons (less sugar), and Italy by 4.7 percent to 225'000 metric tons (less vegetables and oilcakes).

Imports into Ireland were significantly higher than the previous year (84'000 metric tons vs 62'000 metric tons), the growth being explained by the 51'000 metric tons coming from the UK.

Table 39: Total agri-food import volumes by class, 2020 and 2021

	2020 [1000 MT]	2021 [1000 MT]	Change [percent]
Commodities	1'338	1'267	-5.3
Other primary	1'183	1'251	5.7
Processed products incl. Wine	198	212	7.0
Food preparations	44	98	120.1
Non-edible	19	23	22.6
Fish and other non-agri	10	18	87.2
Beverages	2	4	120.4
Total	**2'794**	**2'873**	**2.8**

Source: European Commission/TRACES 2022

Table 40: Organic fruit and vegetable import volumes by product category, 2020 and 2021

	2020 [1000 MT]	2021 [1000 MT]	Change [%]
Tropical fruit, fresh or dried, nuts and Spices	843	903	7.0
Vegetables, fresh, chilled and dried	147	138	-6.5
Fruit, fresh or dried, excl. citrus & tropical fruit	132	143	8.1
Fruit juices	76	85	11.3
Preparations of vegetables, fruit or nuts	56	62	10.9
Citrus fruit	37	36	-3.0
Total	**1'292**	**1'366**	**5.7**

Source: European Commission/TRACES 2022

Table 41: Organic arable crops import volumes by product category, 2020 and 2021

	2020 [1000 MT]	2021 [1000 MT]	Change [%]
Oilcakes	232	209	-9.9
Beet and cane sugar	190	163	-14.3
Oilseeds, other than soybeans	137	145	5.5
Soybeans	137	127	-7.6
Cereals, other than wheat and rice	111	113	1.5
Rice	93	87	-6.8
Wheat	86	50	-41.4
Sugar, other than beet & cane	39	46	19.4
Palm & palm kernel oils	43	42	-2.4
Flours and other products of the milling Industry	22	22	-3.0
Vegetable oils other than palm & olive oils	17	16	-7.8
Starches, inulin & gluten	4	5	15.0
Total	**2'794**	**2'873**	**2.8**

Source: European Commission/TRACES 2022

Table 42: Organic permanent crops (excl. fruit) import volumes by product category, 2020 and 2021

	2020 [1000 MT]	2021 [1000 MT]	Change [%]
Unroasted coffee, tea in bulk & maté	138	145	4.6
Cocoa beans	76	77	1.2
Olive oil	47	45	-5.6
Wine, vermouth, cider and vinegar	17	17	1.9
Roasted coffee and tea	2	3	49.6
Coffee and tea extracts	0.3	0.3	-6.4
Total	**281**	**287**	**2.1**

Source: European Commission/TRACES 2022

Table 43: Organic animal products import volumes by product category, 2020 and 2021

	2020 [MT]	2021 [MT]	Change [%]
Eggs and honey	14'940	16'279	9.0
Milk powders and whey	0	7'615	-
Fresh milk products	1	3'687	-
Bovine meat	275	1'062	286
Non-edible animal products	237	808	242
Cheese	3	630	23'852
Butter	0	359	-
Poultry meat	0	202	-
Sheep and goat meat	18	92	413
Pig meat	0	83	-
Offal, animal fat & other meats	0	3	-
Meat preparations	0	1	-
Total	**15'474**	**30'822**	**99.2**

Source: European Commission/TRACES 2022

Table 44: Organic import volumes by exporting country, 2020 and 2021

Rank	Exporting countries	2020 [MT]	2021 [MT]	Change [%]	Share in total 2021[%]
1	Ecuador	324'071	345'242	6.5	12.0
2	Dominican Republic	252'293	265'075	5.1	9.2
3	India	174'311	205'928	18.1	7.2
4	Peru	200'860	203'577	1.4	7.1
5	Ukraine	217'210	189'239	-12.9	6.6
6	Turkey	155'741	154'938	-0.5	5.4
7	China	227'669	149'283	-34.4	5.2
8	United Kingdom	n/a	107'951	n/a	3.8
9	Colombia	106'766	105'199	-1.5	3.7
10	Mexico	66'127	73'265	10.8	2.6
11	Togo	54'017	68'341	26.5	2.4
12	Tunisia	58'516	55'717	-4.8	1.9
13	Brazil	67'225	55'452	-17.5	1.9
14	Argentina	56'361	55'259	-2.0	1.9
15	Egypt	51'292	52'020	1.4	1.8
16	Honduras	41'800	46'261	10.7	1.6
17	Pakistan	44'942	45'244	0.7	1.6
18	Sri Lanka	37'166	44'528	19.8	1.5
19	Cote D'Ivoire	35'475	35'481	0.0	1.2
20	Kazakhstan	40'692	35'012	-14.0	1.2

Rank	Exporting countries	2020 [MT]	2021 [MT]	Change [%]	Share in total 2021[%]
21	Canada	33'350	30'610	-8.2	1.1
22	South Africa	27'860	28'139	1.0	1.0
23	Chile	27'475	27'909	1.6	1.0
24	Paraguay	32'224	26'931	-16.4	0.9
25	Philippines	26'115	26'136	0.1	0.9
26	Costa Rica	11'935	24'342	104.0	0.8
27	Israel	22'772	23'982	5.3	0.8
28	Ghana	19'730	23'445	18.8	0.8
29	Uganda	23'317	22'452	-3.7	0.8
30	Thailand	29'697	20'077	-32.4	0.7
31	Morocco	18'197	20'077	10.3	0.7
32	Moldova, Republic Of	22'321	19'376	-13.2	0.7
33	Serbia	15'770	19'373	22.8	0.7
34	Burkina Faso	16'631	17'558	5.6	0.6
35	New Zealand	14'322	17'317	20.9	0.6
36	Ethiopia	15'972	17'036	6.7	0.6
37	Sierra Leone	18'288	16'236	-11.2	0.6
38	Russian Federation	31'971	15'919	-50.2	0.6
39	Viet Nam	13'441	15'267	13.6	0.5
40	Bolivia	14'471	12'986	-10.3	0.5
41	Congo, Democratic Republic Of	11'615	12'550	8.0	0.4
42	United States	15'475	11'898	-23.1	0.4
43	Lao People's Democratic Rep.	14'945	11'692	-21.8	0.4
44	Indonesia	9'231	10'802	17.0	0.4
45	Kenya	9'466	9'565	1.1	0.3
46	Benin	7'877	7'708	-2.1	0.3
47	Cambodia	9'861	7'661	-22.3	0.3
48	Madagascar	6'796	6'947	2.2	0.2
49	Nicaragua	5'309	6'869	29.4	0.2
50	Mozambique	4'209	5'311	26.2	0.2
51	Sudan	4'611	4'997	8.4	0.2
52	Sao Tome And Principe	2'970	4'888	64.6	0.2
53	Tanzania	3'908	4'744	21.4	0.2
54	Mali	3'768	4'736	25.7	0.2
55	Japan	3'522	4'503	27.9	0.2
56	Algeria	2'156	2'907	34.8	0.1
57	Senegal	2'400	2'891	20.5	0.1
58	Bosnia and Herzegovina	1'540	2'762	79.4	0.1
59	Guatemala	2'309	2'675	15.9	0.1
60	Belarus	1'536	2'459	60.1	0.1
61	Cuba	1'214	2'444	101.4	0.1
62	Albania	1'825	1'970	7.9	0.1
63	Australia	1'678	1'714	2.1	0.1
64	Iran, Islamic Republic Of	1'873	1'641	-12.4	0.1
65	Uruguay	878	1'409	60.6	0.0
66	Papua New Guinea	1'536	1'388	-9.6	0.0
67	Uzbekistan	918	1'257	36.9	0.0
68	Azerbaijan	1'553	1'228	-20.9	0.0
69	Singapore	541	877	62.1	0.0
70	Palestinian Territory, Occupied	866	861	-0.5	0.0
71	Nigeria	320	831	159.6	0.0
72	Lesotho	489	793	62.0	0.0
73	Niger	580	700	20.7	0.0
74	Rwanda	684	663	-3.0	0.0
75	North Macedonia	345	654	89.6	0.0
76	Georgia	591	653	10.5	0.0
77	Kyrgyzstan	632	645	2.1	0.0

EU Organic Imports

Rank	Exporting countries	2020 [MT]	2021 [MT]	Change [%]	Share in total 2021[%]
78	Chad	322	610	89.4	0.0
79	Kosovo	361	522	44.4	0.0
80	Panama	632	474	-25.0	0.0
81	Maldives	518	455	-12.2	0.0
82	Guyana	495	433	-12.6	0.0
83	Guinea-Bissau	379	426	12.5	0.0
84	Haiti	346	336	-2.8	0.0
85	Zimbabwe	236	314	33.3	0.0
86	United Arab Emirates	343	303	-11.7	0.0
87	Korea, Republic Of	88	300	239.4	0.0
88	Saudi Arabia	223	277	24.2	0.0
89	Nepal	146	230	57.3	0.0
90	Cameroon	183	217	18.9	0.0
91	El Salvador	172	190	10.2	0.0
92	Bangladesh	126	180	43.1	0.0
93	Jordan	4	132	3205.0	0.0
94	Armenia	148	121	-18.4	0.0
95	Taiwan	62	93	50.4	0.0
96	Myanmar	50	90	81.7	0.0
97	Suriname	85	88	3.5	0.0
98	Hong Kong		88	n/a	0.0
99	French Polynesia	93	79	-15.6	0.0
100	Burundi	58	73	25.7	0.0
101	Somalia	32	59	83.2	0.0
102	Samoa	97	51	-47.8	0.0
103	Fiji	37	43	15.3	0.0
104	Comoros	23	42	80.3	0.0
105	Malaysia	105	42	-60.5	0.0
106	Guinea	16	38	140.8	0.0
107	Belize	13	35	170.8	0.0
108	Seychelles	7	24	242.9	0.0
109	Vanuatu	24	21	-12.5	0.0
110	Djibouti	0	18	n/a	0.0
111	Montenegro	56	17	-70.3	0.0
112	Namibia	102	14	-86.7	0.0
113	Lebanon	16	10	-36.0	0.0
114	Angola	5	9	77.8	0.0
115	Switzerland	0	7	n/a	0.0
116	Grenada	0	4	n/a	0.0
117	Zambia	29	1	-95.7	0.0
118	Mauritius	1	1	-38.4	0.0
119	New Caledonia	0	0	180.0	0.0
120	Botswana	0	0	n/a	0.0
121	Malawi	0	0	n/a	0.0
122	Eswatini	11	0	-100.0	0.0
123	Dominica	1	0	-100.0	0.0
124	Solomon Islands	31	0	-100.0	0.0
125	Afghanistan	0	0	-100.0	0.0
126	St. Pierre And Miquelon	2	0	-100.0	0.0
	Total	**2'794'103**	**2'872'948**	**2.8**	

Source: European Commission/TRACES 2022

Table 45: Organic import volumes by product category, 2020 and 2021

Rank	Product categories	2020 imports	2021 imports	Change [%]	Share in total 2021 [%]
1	Tropical fruit, fresh or dried, nuts and Spices	843'237	902'643	7.0	31.4
2	Oilcakes	231'797	208'867	-9.9	7.3
3	Beet and cane sugar	189'831	162'694	-14.3	5.7
4	Vegetables, fresh, chilled and dried	147'425	137'855	-6.5	4.8
5	Unroasted coffee, tea in bulk & maté	138'423	144'733	4.6	5.0
6	Oilseeds, other than soybeans	137'102	144'691	5.5	5.0
7	Fruit, fresh or dried, excl. citrus & tropical fruit	131'934	142'648	8.1	5.0
8	Soybeans	137'308	126'837	-7.6	4.4
9	Cereals, other than wheat and rice	111'371	113'059	1.5	3.9
10	Rice	92'887	86'564	-6.8	3.0
11	Fruit juices	76'052	84'632	11.3	2.9
12	Cocoa beans	76'029	76'911	1.2	2.7
13	Preparations of vegetables, fruit or nuts	56'319	62'435	10.9	1.7
14	Wheat	85'717	50'222	-41.4	2.2
15	Sugar, other than beet & cane	38'818	46'332	19.4	1.6
16	Olive oil	47'196	44'570	-5.6	1.5
17	Palm & palm kernel oils	43'461	42'436	-2.4	1.6
18	Pet food	706	39'008	5'428.6	1.2
19	Food preparations, not specified	29'304	37'758	28.9	1.3
20	Citrus fruit	36'734	35'631	-3.0	0.8
21	Flours and other products of the milling industry	22'291	21'614	-3.0	1.4
22	Bulbs, roots and live plants	15'008	18'147	20.9	0.6
23	Wine, vermouth, cider and vinegar	16'992	17'320	1.9	0.6
24	Eggs and honey	14'940	16'279	9.0	0.6
25	FISH	8'064	16'187	100.7	0.6
26	Vegetable oils other than palm & olive oils	17'336	15'982	-7.8	0.6
27	Miscellaneous seeds and hop cones	8'344	10'706	28.3	0.4
28	Gums, resins and plant extracts	7'258	8'604	18.5	0.3
29	Soups and sauces	5'745	7'635	32.9	0.3
30	Milk powders and whey	0	7'615	n/a	0.2
31	Infant food and other cereals, flour, starch or milk preparations	4'886	6'878	40.8	0.2
32	Pasta, pastry, biscuits and bread	3'159	5'226	65.4	0.2
33	Starches, inulin & gluten	4'499	5'174	15.0	0.3
34	Fresh milk and cream, buttermilk and yoghurt	1	3'687	302'594.9	0.1
35	Waters and soft drinks	1'478	3'313	124.2	0.1
36	Roasted coffee and tea	1'876	2'807	49.6	0.1
37	Cocoa paste and powder	1'971	2'632	33.6	0.1
38	OTHER NON AGRI	1'729	2'147	24.2	0.1
39	Other feed and feed ingredients	2'222	1'725	-22.4	0.1
40	Essential oils	1'561	1'705	9.3	0.1
41	Bovine meat, fresh, chilled and frozen	275	1'062	285.7	0.0
42	Chocolate, confectionery and ice cream	300	965	221.4	0.0
43	Casein, other albuminoidal substances and modified. starches	413	958	131.6	0.0
44	Non-edible animal products	237	808	241.5	0.0
45	Sugar alcohols	674	699	3.6	0.0
46	Cheese	3	630	23'851.8	0.0
47	Butter	0	359	n/a	0.0
48	Coffee and tea extracts	326	305	-6.4	0.0
49	Spirits and liqueurs	157	290	85.6	0.0
50	Ethanol	492	257	-47.7	0.0

EU Organic Imports

Rank	Product categories	2020 imports	2021 imports	Change [%]	Share in total 2021 [%]
51	Poultry meat, fresh, chilled and frozen	0	202	n/a	0.0
52	Fatty acids and waxes	149	142	-5.1	0.0
53	Beer	0	98	n/a	0.0
54	Sheep and goat meat, fresh, chilled and frozen	18	92	413.0	0.0
55	Pig meat, fresh, chilled and frozen	0	83	n/a	0.0
56	Malt	0	75	n/a	0.0
57	Cut flowers and plants	3	9	228.6	0.0
58	Offal, animal fat & other meats, fresh, chilled and frozen	0	3	n/a	0.0
59	Meat preparations	0	1	n/a	0.0
60	Odoriferous substances	45	0	-99.8	0.0
	Total	**2'794'103**	**2'872'948**	**2.8**	

Source: European Commission/TRACES 2022

Standards and Regulations Policy Support

Worldwide Overview of Regulations and Policies on Agroecological Approaches Including Organic

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Introduction

A growing number of governments worldwide support the development of agroecological policies by designing new initiatives and programmes that help achieve the goals set earlier. Regarding regulations, significant changes happened only in the European Union, North America and the Pacific region. This reflects the gradual shift in government approaches worldwide. With most significant markets already regulated, the focus is shifting from national organic standards towards organic supportive strategies and action plans.

Policies fostering agroecology and organic agriculture

Argentina

The National Directorate of Agroecology of Argentina (DNAE) was created in 2020 within the National Secretariat of Agriculture, Livestock and Fisheries to consolidate the gradual, integral and articulated development of public policies to achieve the diffusion of agroecology nationwide. In two years, 120 groups of more than 1'000 producers were created to carry out this transformation that lowers costs, strengthens production models, emancipates producers and reduces risks. These producers have generated added value in their municipalities and pushed them into action. The DNAE, assisted by an integrated advisory council of producers, scientists and social movements, compiled a guide of recommendations and a participatory conceptual

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framework to accompany the promotion of agroecology at the local level. This has led to the signing of a proposal by 100 Argentine municipalities, with the potential to convert 38.6 million hectares to agroecology, benefiting the 5.6 million inhabitants living there. This network represents 12 percent of the country's population and 14 percent of the national surface area.

Saudi Arabia

In recent years, Saudi Arabia has increasingly turned its attention to sustainable agriculture and environmentally friendly farming practices. In 2005, the Ministry of Environment, Water and Agriculture (MEWA) adopted the Organic Agriculture Law to support the organic sector. The government established a functional institutional framework by creating:

- the Department of Organic Production as the competent authority within MEWA,
- the Saudi Organic Farming Association, as a private, independent non-profit organisation incorporating all private actors related to organic agriculture under one umbrella, and
- the National Center for Organic Agriculture as a research institute.

The Saudi Organic Regulation was adopted in 2014 with a national organic agriculture logo serving as the legal framework for the certification of organic farms. So far, six certification bodies have been authorised to operate in the Kingdom.

A national policy for organic agriculture and an executive action plan were passed and approved in 2016 and 2018, respectively, to support the development of the organic sector. Local organic production has increased by more than 130 percent between 2018 and 2021, exceeding 105’000 tonnes in 2021. The organic agricultural land has increased by more than 45 percent and reached 27’100 hectares with 400 farmers in 2021. This remarkable growth is a result of the implementation of the Organic Agriculture Policy Executive Action Plan, which includes measures aiming at spreading awareness of organic agriculture and food, enhancing the supply chain and marketing, supporting research and organic inputs and sharing responsibilities among all stakeholders.

Mexico

In 2018, Mexico made a change to favour food security and food sovereignty policies. This transformation of food systems was undertaken inter-institutionally through a political strategy, with the implementation of joint actions to transform food systems. This transformation has demonstrated its potential impact with internationally recognised actions such as:

1) The implementation of food warning labelling (especially to control ultra-processed foods);

2) The ban on the use of glyphosate and transgenic maize;

3) The support of more than two million farmers in the transition to agroecology;

4) Increasing local production of organic fertilisers and other bio-inputs;

5) Promoting a health system that prevents poor nutrition, including school education at all levels;

6) Working on the regulatory changes needed to support agroecology and organic inputs, among others;

7) Two main programmes of the Presidency: (Producción para el Bienestar) and Sowing Life (Sembrando Vida), both with a budget of over 1 billion USD in 2022.

Ghana

The Food and Agriculture Sector Development Policy I and II (FASDEP II) has been the overarching policy in the Ghanaian agricultural sector. For the past two years, the National Medium-Term Development Plan for the implementation of the FASDEP II has been the Investing for Food and Jobs (IFJ). The IFJ is an agenda by the Government of Ghana to transform agriculture through a private sector-driven approach to improve self-sufficiency in food production as well as food and nutritional security. This is done through generating jobs, value addition to agricultural products, export enhancement and import substitution and increased incomes for all actors along commodity value chains. The IFJ has been reviewed, and a draft sector plan for the next medium-term has been prepared, called IFJ II.

The principles of IFJ II embrace the advancement in organic agriculture growth, where the Public Sector Support Systems ostensibly support the guaranteed principles of organic soil fertility management and practices as well as environmentally acceptable pest and disease control management, more importantly on fruits and vegetable production.

Even though the Government's position on production in the agriculture sector does not discriminate between organic and inorganic agriculture, the theory of change behind the IFJ II generates keen interest and opportunities associated with the growth of organic agriculture in Ghana. Between 2021 and 2022, government officials encouraged farmers to adopt and intensify the use of organic manure, such as poultry manure, to enrich their soil fertility and improve the economics of production. Some actions the Government will focus on in the medium to long term include promoting increased use of organic fertilisers by:

1) Supporting the private sector to establish organic fertiliser processing plants and improve the quality of organic fertilisers in general;

2) Establishing an assured raw material base suitable for organic fertiliser production;

3) Exploring incentives for domestic organic fertiliser producers;

4) Reviewing and enforcing the regulatory framework for the production and trading of organic fertilisers; and

5) Promoting the adoption of organic agricultural inputs by farmers across the country.

Tanzania

The Tanzanian government, through the Ministry of Agriculture, in cooperation with stakeholders in the organic sector, is currently developing the National Strategy for Ecological Organic Agriculture 2022-2030, which aims to improve the agricultural sectors by protecting soil and water, promoting biodiversity and respecting the environment. The strategy will be instrumental in implementing the policy statement

of the 2013 National Agricultural Policy, which envisages the promotion of organic agriculture to increase foreign earnings and household incomes from the export of high-value organic products through an increased supply.

Additionally, the National Environmental Master Plan 2022 provides strategic interventions that consider spatial variations and appropriate policy options to guide environmental management at all levels. Practices include agroforestry, soil conservation, soil fertility management, promotion of sustainable agriculture (e.g., conservation agriculture, climate-smart agriculture and organic agriculture), protection of biodiversity, ecosystem services and livelihoods.

In 2022, the Horticulture Development Strategy 2021-2031 was also finalised and launched, which is meant to boost the competitiveness of the horticulture sub-sector in national, regional and international markets in a sustainable way over the next ten years. The strategy includes a strategic intervention to create awareness and promote the production and productivity of organic horticultural crops.

India

Since 2020, natural farming has been expanded in India with the involvement of central and state governments. Under the centrally sponsored programme - Paramparagat Krishi Vikas Yojana (PKVY) (i.e. the Traditional Agriculture Development Programme) - natural farming is promoted as the «Bharatiya Prakritik Krishi Paddhati Programme» (BPKP) (i.e. the Indian Natural Agriculture Programme). The BPKP aims to promote traditional indigenous practices that reduce externally purchased inputs. It is based mainly on on-farm biomass recycling, with emphasis on biomass mulching, the use of on-farm cow dung formulations, periodic soil aeration and the exclusion of all synthetic chemical inputs. The BPKP is being upscaled as National Mission on Natural Farming (NMNF) for implementation nationwide. NMNF aims at creating institutional capacities for documentation and dissemination of best practices while making practising farmers partners in the promotion strategy, ensuring capacity building and continuous handholding and finally attracting farmers to natural farming willingly on the merit of the system.

To date, the following states declared the adoption of the BPKP programme: Andhra Pradesh, Gujarat, Himachal Pradesh, Karnataka, Kerala, Uttar Pradesh and Uttarakhand. The federal government is planning to make funds available for all Indian states to promote both organic and natural farming in 2023, which will likely result in further growth of sustainable agriculture and food production in India.

Environmental programmes are also on the rise in the country, e.g. the Namami Gange Programme aims to reduce pollution, conserve and rejuvenate the river Ganges. The catchment area is to be free of chemical residues used in agriculture. Uttarakhand, Uttar Pradesh, Bihar, Jharkhand and West Bengal have been involved in the programme with different components of chemical-free agriculture.

In India, Traditional Organic Areas have been identified by the Department of Agriculture, Cooperation and Farmers Welfare (DAC&FW) to be converted into certified organic production hubs through the “Large Area Certification” (LAC)

scheme. An area of 14'491 hectares in the Union Territory of the Andaman and Nicobar Islands has become the first large contiguous territory to be awarded organic certification under the LAC scheme of the PGS-India certification programme. Similar work is underway in the Union Territory of Ladakh in Jammu & Kashmir.

Regulations

In terms of regulations, according to the latest data collected by IFOAM – Organics International in 2022, there are 74 that have fully implemented regulations on organic agriculture. A total of 21 countries have organic regulations that are not fully implemented, and 15 are drafting legislation (Table 46 and Table 47). Countries undergoing significant revisions include the European Union, New Zealand and the USA.

Table 46: Organic regulations worldwide by region

Continent	Drafting	Fully implemented	Not fully implemented	Total
Africa	7	2	3	12
Asia	6	11	11	28
Europe		39	4	43
Latin America and the Caribbean	2	16	3	21
North America		2		2
Oceania		4		4
Total	**15**	**74**	**21**	**110**

Source: IFOAM – Organics International

The European Union

The scope of Regulation (EU) 2018/848 covers sea salts and other salts for food and feed; however, the detailed production rules have not been laid down. The Commission's expert group for technical advice on organic production (EGTOP) with an expert subgroup on salt has evaluated the production techniques and concluded that salt from the sea, from rock salt deposits, from natural brine and salt lakes are in line with the objectives and principles of organic production. In 2022 the Commission stated that it would take into consideration the recommendation of the EGTOP and aim to finalise its work on the delegated act to amend Regulation (EU) 2018/848 by adding detailed and specific production rules for sea salts and other salts, in line with the objectives and principles of organic production. It is expected that it will not be mandatory to use certified organic salt in processing.

In addition, to salt, the Commission started its work on the production rules for organic insects. At present, insects are considered to be agricultural products within the scope of Article 2(1) (a) of Regulation (EU) No 2018/848. Insects also fall under the definition of livestock production set out in Article 3(27) of Regulation (EU) 2018/848; however, there are no detailed rules for the production of other organic insects than bees. It is expected that the Commission will start public consultations on this matter in 2023.

On the 1st of January 2023, the period for transition to electronic provision of certificates ended. Following Article 35(1), point (a), of Regulation (EU) 2018/848, the certificate

provided by the competent authorities or, where appropriate, control authorities or control bodies to operators or groups of operators is to be issued in electronic form through the Trade Control and Expert System (TRACES). This will complement the already acting rule on using TRACES to issue the electronic inspection certificate for imported organic products into the European Union.

Pacific Region

On 29 July 2022, the Pacific Organic and Ethical Trade Community launched the first edition of the Pacific Organic Standard (POS) Guidebook. The Guidebook describes the requirements of the Pacific organic standard for organic production and processing and provides farmers with a comprehensive guide to growing and certifying organic products. Designed for farmers, producers and consumers of POS-certified products wanting to understand and be inspired by the POS standard, the guidebook does not replace the POS official standard but must be seen as a support document.

New Zealand´s Organic Products Bill was read in the House on 27 October 2022 and was endorsed by the majority of the parties. The next stage for the Bill will be the Committee of the Whole House, where MPs will have another chance to debate the contents of the Bill and the proposed changes.

Two key amendments relate to how the organic sector can be involved in scrutinising the standard. First is the addition, in the bill, of the possibility for a relevant Minister to create an advisory council broadly representative of the sector. This council could provide crucial sector advice to relevant ministers or chief executives, including on the interpretation and ongoing maintenance of organic standards and implementation of the regulations.

The other key amendment related to the organic standard is a change in how organic standards can be made. The bill splits the standards-making process into two parts. The regulations will specify the scope, standards, and high-level principles, which should guide the technical parts of the standard, which can now be made by notice.

USA

On 29 March 2022, the U.S. Department of Agriculture published the Origin of Livestock (OOL) final rule for organic dairy. According to the law, dairy livestock operators will be able to switch to organic or start a new organic farm by transitioning non-organic livestock only once. The rule also prohibits sourcing any transitioned animals. After the organic certification, the organic operator may only add animals that have been organically managed from the last third of gestation.

Table 47: Regulations on organic agriculture worldwide

Country	Status of regulations on organic agriculture	Relevant Remarks
Afghanistan		
Albania	Fully Implemented	
Algeria	Drafting	
Andorra	Fully Implemented	
Antigua and Barbuda		
Argentina	Fully Implemented	
Armenia	Not fully Implemented	

Regulations and Policies

Country	Status of regulations on organic agriculture	Relevant Remarks
Australia	Fully Implemented	Only for export.
Austria	Fully Implemented	Regional compulsory regulation (EU Regulation)
Azerbaijan	Not fully Implemented	
Bahamas		
Bahrain		
Bangladesh	Drafting	
Barbados		
Belarus	Not fully implemented	
Belgium	Fully Implemented	Regional compulsory regulation (EU Regulation)
Belize		
Bhutan	Fully Implemented	
Bolivia	Fully Implemented	PGS recognition.
Bosnia & Herzegovina	Not fully Implemented	
Botswana		
Brazil	Fully Implemented	PGS recognition.
Brunei Darussalam		
Bulgaria	Fully Implemented	Regional compulsory regulation (EU Regulation)
Burkina Faso		
Burundi		Regional voluntary standards (EAOPS)
Cambodia	Drafting	
Cameroon	Drafting	
Canada	Fully Implemented	
Cape Verde		
Central African Republic		
Chile	Fully Implemented	PGS recognition.
China	Fully Implemented	
Colombia	Fully Implemented	
Comoros		
Congo, Dem. Rep.		
Congo, Rep.		
Costa Rica	Fully Implemented	PGS recognition.
Croatia	Fully Implemented	Regional compulsory regulation (EU Regulation)
Cuba	Not fully Implemented	
Cyprus	Fully Implemented	Regional compulsory regulation (EU Regulation)
Czech Republic	Fully Implemented	Regional compulsory regulation (EU Regulation)
Denmark	Fully Implemented	Regional compulsory regulation (EU Regulation)
Djibouti		
Dominica		
Dominican Republic	Fully Implemented	
DPR Korea		
East Timor		
Ecuador	Fully Implemented	PGS recognition.
Egypt	Not fully Implemented	
El Salvador	Not fully Implemented	
Equatorial Guinea		
Eritrea		
Estonia	Fully Implemented	Regional compulsory regulation (EU Regulation)
Eswatini		
Ethiopia	Not fully Implemented	
Fiji		Regional voluntary standards (POS)
Finland	Fully Implemented	Regional compulsory regulation (EU Regulation)
France	Fully Implemented	Regional compulsory regulation (EU Regulation)
French Polynesia	Fully Implemented	Regional voluntary standards (POS); PGS Recognition.
Gabon		
Gambia		
Georgia	Fully Implemented	
Germany	Fully Implemented	Regional compulsory regulation (EU Regulation)
Ghana		
Greece	Fully Implemented	Regional compulsory regulation (EU Regulation)
Grenada		
Guatemala	Fully Implemented	
Guinea		
Guinea-Bissau		
Guyana		
Guyana		
Haiti		
Honduras	Fully Implemented	
Hong Kong		
Hungary	Fully Implemented	Regional compulsory regulation (EU Regulation)

Country	Status of regulations on organic agriculture	Relevant Remarks
Iceland	Fully Implemented	
India	Fully Implemented	PGS recognition.
Indonesia	Fully Implemented	
Iran	Not fully Implemented	
Iraq		
Ireland	Fully Implemented	Regional compulsory regulation (EU Regulation)
Israel	Fully Implemented	
Italy	Fully Implemented	Regional compulsory regulation (EU Regulation)
Ivory Coast		
Jamaica	Drafting	
Japan	Fully Implemented	
Jordan	Not fully Implemented	
Kazakhstan	Not fully Implemented	
Kenya		Regional voluntary standards (EAOPS)
Kiribati (Micronesia)		Regional voluntary standards (POS)
Kosovo		
Kuwait	Fully Implemented	
Kyrgyzstan	Not fully Implemented	
Laos		
Latvia	Fully Implemented	Regional compulsory regulation (EU Regulation)
Lebanon	Drafting	
Lesotho		
Liberia		
Libya		
Liechtenstein	Fully Implemented	
Lithuania	Fully Implemented	Regional compulsory regulation (EU Regulation)
Luxemburg	Fully Implemented	Regional compulsory regulation (EU Regulation)
Madagascar	Not fully Implemented	PGS recognition.
Malawi		
Malaysia	Fully Implemented	
Maldives		
Mali		
Malta	Fully Implemented	Regional compulsory regulation (EU Regulation)
Marshall Islands		Regional voluntary standards (POS)
Mauritania		
Mauritius	Drafting	
Mexico	Fully Implemented	PGS recognition.
Micronesia		Regional voluntary standards (POS)
Moldova		
Monaco		
Mongolia	Not fully implemented	PGS recognition.
Montenegro	Fully Implemented	
Montserrat		
Morocco	Fully Implemented	
Mozambique	Drafting	
Myanmar		
Namibia		
Nauru		Regional voluntary standards (POS)
Nepal		
Netherlands	Fully Implemented	Regional compulsory regulation (EU Regulation)
New Caledonia	Fully Implemented	Regional voluntary standards (POS); PGS recognition.
New Zealand	Fully Implemented	Only for export.
Nicaragua	Fully Implemented	
Niger		
Nigeria		
Niue		Regional voluntary standards (POS)
North Macedonia		
Norway	Fully Implemented	
Oman		
Pakistan	Drafting	
Palau		Regional voluntary standards (POS)
Palestine		
Panama	Fully Implemented	
Papua New Guinea		Regional voluntary standards (POS)
Paraguay	Fully Implemented	PGS recognition.
Peru	Fully Implemented	PGS recognition.
Philippines	Not fully Implemented	PGS recognition.
Poland	Fully Implemented	Regional compulsory regulation (EU Regulation)
Portugal	Fully Implemented	Regional compulsory regulation (EU Regulation)

Regulations and Policies

Country	Status of regulations on organic agriculture	Relevant Remarks
Qatar		
Republic of Korea	Fully Implemented	
Romania	Fully Implemented	Regional compulsory regulation (EU Regulation)
Russia	Not fully Implemented	
Rwanda		Regional voluntary standards (EAOPS)
Saint Lucia		
Saint Vincent and the Grenadines		
Samoa		Regional voluntary standards (POS)
San Marino	Fully Implemented	
Sao Tome and Principe		
Saudi Arabia	Not fully implemented	
Senegal		
Serbia	Fully Implemented	
Seychelles	Drafting	
Sierra Leone		
Singapore		
Slovak Republic	Fully Implemented	Regional compulsory regulation (EU Regulation)
Slovenia	Fully Implemented	Regional compulsory regulation (EU Regulation)
Solomon Islands		Regional voluntary standards (POS)
Somalia		
South Africa	Drafting	
South Sudan		
Spain	Fully Implemented	Regional compulsory regulation (EU Regulation)
Sri Lanka	Drafting	
St. Kitts and Nevis		
St. Lucia	Drafting	
St. Vincent and the Grenadines		
Sudan	Drafting	
Suriname		
Sweden	Fully Implemented	Regional compulsory regulation (EU Regulation)
Switzerland	Fully Implemented	
Syria		
Taiwan	Fully Implemented	
Tajikistan	Not fully Implemented	
Tanzania		Regional voluntary standards (EAOPS)
Thailand		
Togo		
Tonga		Regional voluntary standards (POS)
Trinidad and Tobago		
Tunisia	Fully Implemented	
Turkey	Fully Implemented	
Turkmenistan		
Tuvalu		Regional voluntary standards (POS)
Uganda		Regional voluntary standards (EAOPS)
Ukraine	Not fully Implemented	
United Arab Emirates	Fully Implemented	
United Kingdom	Fully Implemented	Regional compulsory regulation (EU Regulation)
Uruguay	Fully Implemented	PGS recognition.
USA	Fully Implemented	
Uzbekistan	Drafting	
Vanuatu		Regional voluntary standards (POS)
Venezuela	Not Fully Implemented	
Vietnam	Not fully Implemented	
Yemen		
Zambia		
Zimbabwe		

Source: IFOAM – Organics International

Participatory Guarantee Systems in 2022

SARA ANSELMI[1] AND FLÁVIA MOURA E CASTRO[2]

Participatory Guarantee Systems (PGS) are locally focused quality assurance systems. They certify producers based on the active participation of stakeholders and are built on a foundation of trust, social networks, and knowledge exchange (IFOAM definition, 2008).

IFOAM – Organics International is the only organisation collecting data about PGS on a global level. To date[3], we have recorded 323 PGS initiatives in 76 countries, with at least 1'417'522 producers involved and 1'328'496 producers certified (Table 48, Figure 57). It is estimated that these producers manage 887'744 hectares of land.

Despite additional efforts implemented during the survey carried out in 2022, it was not possible to collect or update information about the total organic area managed by PGS-certified producers for over 50 percent of all operational PGS initiatives. This includes initiatives based in countries reporting many PGS-certified producers, such as Brazil and countries with numerous PGS initiatives, such as Bolivia. Therefore, the total organic area managed by PGS-certified producers is likely much larger than estimated here[4].

With more than 1.3 million certified producers, India is home to the majority of producers involved in PGS. Certified producers under the official governmental PGS program manage 795'094 hectares of organic area, while 4'619 hectares are managed organically by producers involved in at least two other PGS initiatives also active in the country, operating outside the governmental program. Hence, the total number of PGS-certified producers in India now amounts to at least 1'288'351[5], representing a 10 percent increase compared to the previous year.

Worldwide, there are seven countries with more than 1'000 producers certified by PGS, in addition to India: Brazil (8'864), Thailand (8'603), Peru (4'565), Tanzania (2'320), Kyrgyzstan (1'097), Kenya (1'078) and France (1'064).

The numbers of producers certified through PGS have been increasing in the past four years in all regions, except for **Europe** and **Oceania**, which reported a decrease of 1.2

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[3] Data collection was carried out until 30 November 2022.

[4] A conservative estimate could be based on the assumption that the majority of producers benefitting from PGS certification in Brazil, for example, manage at least 2 hectares of land. This would add about 17'250 ha to the total organic area managed by PGS-certified producers in Brazil. For Bolivia it is more complicated to make similar estimations due to the lack of data on the number of producers involved in at least 41 of all operational PGS initiatives.

5 This total excludes 771 producers that were reported as being certified both under the national PGS program and by the initiative PGS Organic Council.

percent and 13.4 percent, respectively, compared to the previous year. **Asia** has seen an increase in the number of certified producers, mostly due to India once again, even though the 10 percent growth shows a major deceleration compared to 2021 and 2020.



Figure 57: Development of PGS-certified producers worldwide 2010-2022

Source: IFOAM – Organics International 2022

In 2022, IFOAM - Organics International launched the new Global Map of PGS Initiatives,[1] with an improved layout and video instructions on how to submit information. Through this collectively managed platform, PGS coordinators can regularly update their contact details, annual figures and general information, contributing to a global overview of PGS as these initiatives continue to increase in number and size for the benefit of thousands of organic producers and processors building sustainable food systems all over the world.

General Developments (per region)

Africa

At least 48 PGS initiatives (33 operational and 15 under development) are currently documented in Africa. The region reports an increase of 7.18 percent in certified producers and 19.5 percent in terms of involved producers compared to the previous year. A major development is observed in the total area certified, which currently

[1] For more information see the website of IFOAM – Organics International https://pgs.ifoam.bio

amounts to 31'479 hectares, mostly due to Namibia: the national PGS initiative implemented by the Namibian Organic Association (NOA) reported 26'502 hectares of certified organic land[1].

Four countries in the region reported a significant increase in PGS-certified producers and hectares: Benin, Burkina Faso, Kenya, and Tanzania. While the number of PGS-certified producers essentially doubled for Benin, increased by 50 percent in Burkina Faso and by 30 percent in Tanzania, it was in Kenya that the most significant development was observed: there are now 900 certified producers more than there were in 2021, for a total of 1'078. Currently, 14 local groups in Kenya can access the Kilimohai logo (East African Organic Mark) granted by the national organic agriculture movement, Kenya Organic Agriculture Network (KOAN). This development is attributed to the implementation of various projects supporting PGS and the growth of the domestic organic market. The first Kenya National PGS Workshop was organised in November 2022 as part of efforts to better structure PGS in the country under the oversight of KOAN. It was supported by Biovision Africa Trust (BVAT) and FiBL.

Mozambique also reported a significant increase in the total of producers certified (+147) and involved in PGS (+77) compared to the previous year. This is particularly relevant since the Ministry of Agriculture and Rural Development (MADER) is currently developing a proposal to regulate organic agriculture in the country. The latest draft does not consider PGS as an accepted approach to verify conformity with organic standards. There are risks that smallholders and family farmers, including those currently involved in PGS, will not be able to benefit from the regulation unless an inclusive consultation process is carried out and the final text reflects the needs and experience of the national stakeholders.

Asia

All countries that submitted updates for this region reported increased certified and involved producers, except Cambodia and the Philippines. In Cambodia, the reduction (from 112 certified producers in 2021 to 26 in 2022; from 249 involved producers in 2021 to 132 in 2022) is related to the fact that at least two PGS initiatives are no longer active due to a lack of funding. In the Philippines, the reduction of 301 producers certified and of 2'027 producers involved could be related to the changes in the legal framework that took place in 2020. After the promulgation of the Amendment to the Organic Agriculture Act of 2010 (Republic Act No. 11511), which recognises PGS, many PGS initiatives that had been operational for years started a process to revise their systems and processes in order to receive government accreditation. At the same time, new PGS initiatives were formed with support from the government but are not yet accredited and therefore did not report any certified producers.

India remains at the forefront (+10 percent growth in terms of certified farmers and +4.7 percent increase in farmland, compared to 2021), followed by Thailand (which reported

[1] It is important to highlight that this data for Namibia was not previously available and that the high figure is related to the organic rangeland farms managed by three of the five producers currently certified there.

four times more PGS-certified farmers and over 40'000 more producers involved in PGS, compared to 2021). Asia remains the region with the highest number of producers certified and involved in PGS and the second region (after Latin America) in terms of operational PGS initiatives.

Europe and North America

With 25 PGS initiatives in 2022 (-6, compared to 2021), Europe also reports a slight reduction in the total number of certified producers and area under organic management. Greece and Hungary are not included in the overview, as we can no longer confirm active PGS initiatives in those countries. Belgium and Italy are the only countries reporting a moderate increase, both in terms of producers certified and involved in PGS.

North America did not report any major change in 2022. The PGS initiative Certified Naturally Grown (CSA), with members in the USA and Canada, reported a decrease of 6 percent in the total of certified and involved producers compared to 2021.

Latin and Central America

In 2022, Central and Latin America saw a significant increase in producers involved in PGS (+21.5 percent) and certified through PGS (+14.7 percent) compared to 2021. The main increase in certified producers was observed in Peru, with 2.5 times more certified producers compared to the previous year. It is important to mention that the number of producers involved in and certified through PGS in this region is certainly underestimated, in particular, due to Bolivia. Although the country reports a decrease in these figures compared to 2021, it was not possible to collect data from the majority of the 42 PGS initiatives accredited by the Bolivian Government[1].

This is the region where the most PGS initiatives are being implemented (141 operational and at least five under development), and Bolivia is the frontrunner in terms of the total number of operational PGS initiatives (45), followed by Brazil (28), Chile (24) and Peru (16).

Oceania

The region reports 16 PGS initiatives (12 operational, four under development). The majority of the PGS initiatives are based in the Pacific Islands. A slight decrease in certified producers (-140) and a significant increase in producers involved in PGS (+1'640) have been observed in 2022 compared to the previous year. The latter is related to an increase in the number of producers joining the PGS initiative "Farm Support Association / Syndicat Agricol Pastoral" in Vanuatu. The figure will likely continue to increase due to the implementation of the Vanuatu Sustainable Tourism Strategy (VSTS, 2021-2025) for the recovery of the tourism sector, which specifically indicates the need to increase local organic production and to support PGS development to achieve

[1] Data for Bolivia was collected through interviews and the national PGS database, which does not indicate the number of producers involved in each accredited PGS initiative.

the transition to a more resilient and less dependent tourism industry. The total area certified in 2022 for Oceania is also bigger, mainly due to certified operations in New Caledonia, which now manage an additional 1'376'58 ha compared to what was reported the previous year.

The Pacific Organic and Ethical Trade Community (POETCom) has been engaged in the promotion of organic agriculture and PGS in the Pacific Islands. It is important to highlight efforts being implemented by POETCom to support their members and licensees in adopting a gender-sensitive approach. Gender mainstreaming within the organic movement is still at an initial stage. POETCom has been one of the few organisations taking clear steps to address this gap, for example, through collecting gender-disaggregated data among PGS members and certified producers. This is still relatively uncommon among PGS initiatives worldwide, and efforts in this direction will make it possible to better understand women's roles, needs and valuable contributions to the organic movement.

General notes on the data

Every three years IFOAM – Organics International conducts a global PGS survey. In 2022, the survey was conducted using the Global Map of PGS initiatives, bilateral remote communication with PGS initiatives coordinators, online national databases, and direct communication with competent authorities and PGS experts. For some PGS initiatives, no new data was received; therefore, data from the previous year was used. PGS initiatives that have not submitted data for the past four years were considered to be no longer active and thus excluded from the current statistics.

In countries where PGS are recognised under the national organic regulation, data collected and published by competent authorities was used. This is the case in Brazil[1], Bolivia[2], Chile[3], Costa Rica[4], and India[5]. Mexico[6] and Peru[7] also recognise PGS, and general information is available online for those initiatives that are recognised by the competent authority, but there are many initiatives in both countries that have been operational for years and are not included in the official registries, so additional data provided by local PGS experts and organic stakeholders was used, in addition to the official information available online.

Definitions used

- **PGS initiative:** Entity or organisation that has defined/chosen/adopted a common set of standards for organic agriculture and a common set of procedures (i.e., they have a common manual describing those procedures) and that has a coordination body (i.e., secretary, association) that has the overview of the data coming from the regional/subgroups, local groups or the individual farmers directly. A PGS initiative will

[1] Ministério da Agricultura, Pecuária e Abastecimento, Brasil: Cadastro Nacional de Produtores Orgânicos. Available at http://www.agricultura.gov.br/assuntos/sustentabilidade/organicos/cadastro-nacional-produtores-organicos

[2] Servicio Nacional de Sanidad Agropecuaria e inocuidad alimentaria (SENASAG), Bolivia. Available at https://paititi.senasag.gob.bo/egp/registroEcologico.html

[3] Servicio Agrícola y Ganadero, Chile: Certificación de Productos orgánicos. Available at http://www.sag.cl/ambitos-de-accion/certificacion-de-productos-organicos/132/registros

[4] Servicio Fitosanitario del Estado, MAG, Costa Rica: Registrados en Arao - Certificación Participativa. Available at https://www.sfe.go.cr/SitePages/ARAO/InicioARAO.aspx

[5] Department of Agriculture & Cooperation, India: Participatory Guarantee System for India. Available at http://pgsindia-ncof.gov.in

[6] Servicio Nacional de Sanidad, Inocuidad y Calidad Agroalimentaria, Mexico: https://www.gob.mx/cms/uploads/attachment/file/692697/Sistemas_de_Certificacion_Organica_Participativa_2021.pdf

[7] Servicio Nacional de Sanidad Agraria, Peru: https://www.gob.pe/institucion/senasa/informes-publicaciones/1496773-lista-de-entidades-de-certificacion-de-la-produccion-organica-registrados-ante-senasa

also typically use one standard label to identify their farmers' organic products and/or a logo used by other PGS initiatives, such as a national/regional organic logo.
Explanatory note: A PGS initiative can be composed of one local group, especially at the initial stage of development. Even though it is common for PGS initiatives to be composed of various local groups, it is also possible that the PGS producers in a PGS initiative work together based on geographic proximity or technical expertise without forming a local group.

- **PGS status:** Setting up a PGS is a long process that requires two or more years before the producers can be fully certified. In our data collection, we distinguish between two situations:
- **Operational PGS:** a PGS implementing a functional certification system to certify their producers and has issued at least one certificate to one farmer.
- **PGS** under **development:** a PGS that is in the process of developing a functional certification system to certify their producers and has not yet issued any certificates.

The **number of producers** within a PGS: There are two categories of producers considered for a PGS initiative:

- **Producers involved:** Farmers and processors that are involved in a PGS either as certified or as not yet having received certification, including those that are in the process of conversion and that are expecting/intending to get a PGS certificate in the near future.
- **Producers certified:** Farmers and processors that have been verified through a PGS and that have received a PGS certificate or proof of certification if they are approved as part of a group within a PGS initiative.

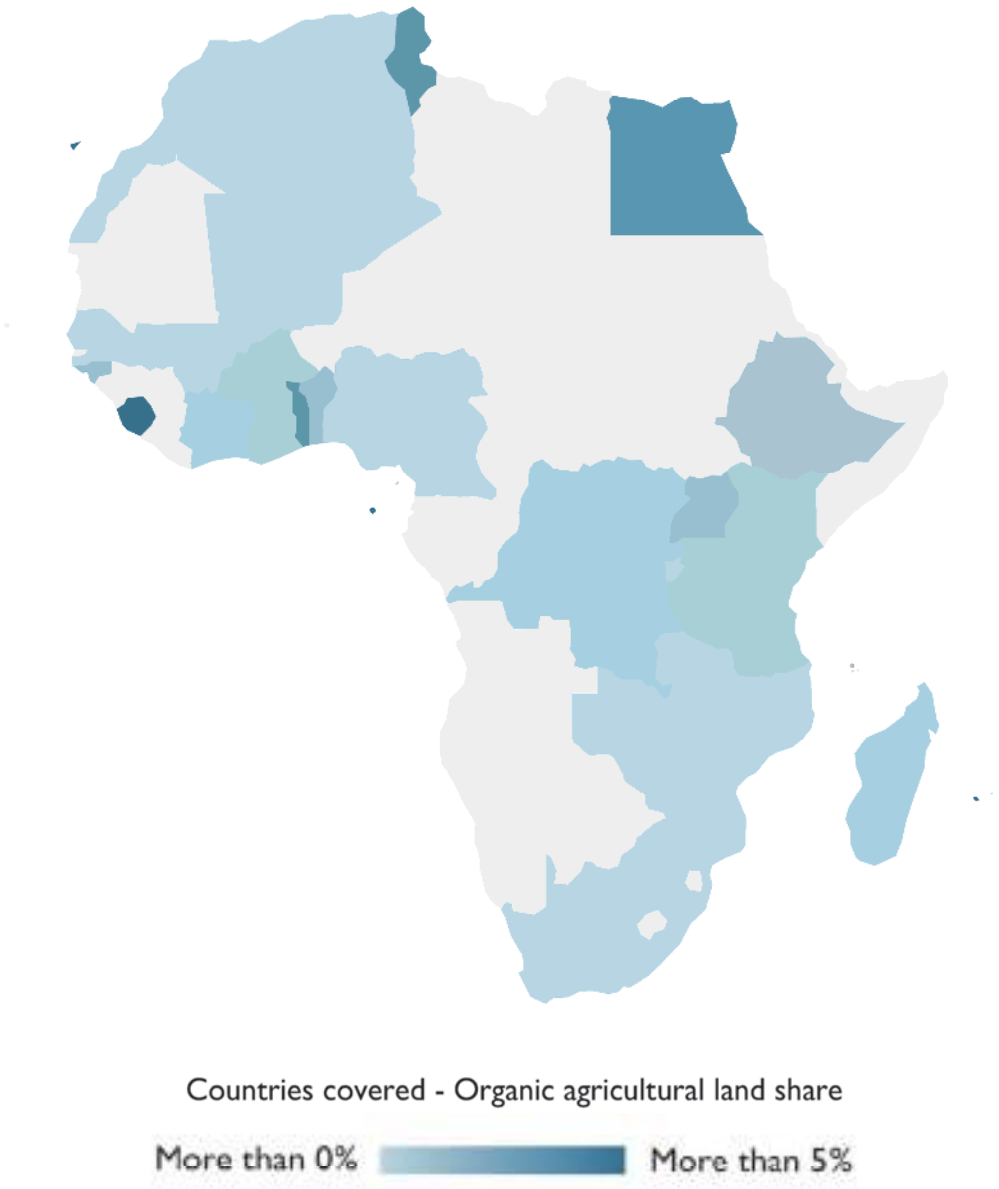
Table 48: Participatory Guarantee Systems worldwide 2022

Country	PGS Initiatives	Producers certified	Producers involved	Operational initiatives	Initiatives under development	PGS-certified land [ha]
Africa	**48**	**7'598**	**23'719**	**33**	**15**	**33'720**
Benin	1	450	700	1	0	164
Burkina Faso	1	864	1'476	1	0	180
Burundi	1	0	4'820	0	1	
Cameroon	1	40	160	1	0	
Ethiopia	1	0	30	0	1	
Ghana	2	36	500	1	1	120
Guinea	1	0	59	0	1	
Ivory Coast	1	0	35	0	1	
Kenya	1	1'078	1'587	1	0	1'442
Mali	1	250	1'352	1	0	112
Mauritius	1	0	0	0	1	
Morocco	1	55	61	1	0	352
Mozambique	1	167	167	1	0	0
Namibia	1	5	9	1	0	26'502
Nigeria	1	706	706	1	0	45
Rwanda	1	0	158	0	1	
Sao Tome/ & Principe	1	13	40	1	0	2
Senegal	1	291	500	1	0	370
South Africa	17	361	641	14	3	479
Tanzania	6	2'320	2'716	5	1	3'605
Togo	4	497	763	0	4	341
Uganda	1	450	7'224	1	0	
Zimbabwe	1	15	15	1	0	6
Asia	**87**	**1'302'243**	**1'357'273**	**58**	**29**	**815'016**
Bangladesh	1	0	123	0	1	0
Bhutan	1	0	100	0	1	
Cambodia	7	26	132	0	7	2
China	3	0	1'129	0	3	
India	3	1'289'122	1'294'742	3	0	799'713
Indonesia	1	367	547	1	0	96
Japan	1	6	8	1	0	2

Country	PGS Initiatives	Producers certified	Producers involved	Operational initiatives	Initiatives under development	PGS-certified land [ha]
Kyrgyzstan	1	1'097	3'000	1	0	2'667
Laos	3	334	500	2	1	773
Malaysia	1	26	115	1	0	
Mongolia	2	6	35	2	0	4
Myanmar	1	304	304	1	0	379
Nepal	12	171	288	7	5	15
Philippines	20	229	595	11	9	363
South Korea	1	780	2'200	1	0	207
Sri Lanka	3	408	837	1	2	224
Taiwan	2	60	471	2	0	
Thailand	15	8'603	51'082	15	0	8'855
Vietnam	9	704	1'065	9	0	1'716
Europe	**25**	**1'647**	**2'762**	**16**	**9**	**4'470**
Belgium	2	90	224	2	0	
Bosnia	1	0	5	0	1	
Czech Republic	1	8	15	0	1	
France	4	1'064	1'798	3	1	250
Germany	1	38	38	0	1	2'670
Italy	4	237	347	2	2	1'368
Spain	11	210	305	9	2	92
Turkey	1	0	30	0	1	90
Latin America	**146**	**15'457**	**29'761**	**141**	**5**	**12'685**
Argentina	2	20	40	1	1	170
Belize	1	0	5	0	1	
Bolivia	45	262	1'720	45	0	107
Brazil	28	8'864	8'864	28	0	2'564
Chile	24	264	264	24	0	908
Colombia	6	373	649	6	0	1'528
Costa Rica	7	69	74	7	0	187
Cuba	1	0	3'712	0	1	0
Ecuador	4	637	1'877	4	0	80
El Salvador	1	18	18	1	0	
Guatemala	1	25	50	1	0	1
Mexico	7	85	216	5	2	177
Paraguay	2	78	211	2	0	235
Peru	16	4'627	11'561	16	0	6'178
Uruguay	1	135	500	1	0	550
North America	**1**	**650**	**750**	**1**	**0**	**8'440**
USA	1	650	750	1	0	8'440
Oceania	**16**	**901**	**3'257**	**12**	**4**	**13'413**
Australia	2	14	25	1	1	2'200
Cook Islands	1	4	17	1	0	23
Fiji	7	483	875	5	2	9'166
French Polynesia	1	67	115	1	0	323
New Caledonia	1	155	240	1	0	1'676
New Zealand	1	130	130	1	0	
Samoa	1	0	190	0	1	
Solomon Isl.	1	48	54	1	0	25
Vanuatu	1	0	1'611	1	0	0
Total	**323**	**1'328'496**	**1'417'522**	**261**	**62**	**887'744**

Source: PGS survey of IFOAM – Organics International, 2022

Africa



Map 2: Organic agricultural land in the countries of Africa 2021

Source: FiBL survey 2023 based on information from the private sector, certifiers, governments, and the Mediterranean Organic Agricultural Network (MOAN) for the Mediterranean countries
For detailed data sources, see annex, page 338

Developments in Organic Agriculture in Africa

DAVID M. AMUDAVI[1], VENANCIA WAMBUA[2], ALEX MUTUNGI[3], MOSES O. AISU[4] AND OLUGBENGA O. ADEOLUWA[5]

Introduction

Ecological Organic Agriculture (EOA) in Africa continued to receive much attention from various actors, including farmers, practitioners, researchers, policymakers and other stakeholders post-COVID-19 pandemic. Various studies conducted around organic and conventional systems demonstrated the potential of EOA to contribute to food security and nutrition, land degradation restoration, poverty alleviation, climate change mitigation and resilience, among other socioeconomic and environmental benefits.

The Ecological Organic Agriculture Initiative (EOA-I)

The Ecological Organic Agriculture Initiative (EOA-I)[6], supported by the African Union (AU), the Swiss Agency for Development and Cooperation (SDC) and the Swedish Society for Nature Conservation (SSNC), among other development partners, reached out to many smallholder farmers across Africa. The initiative aims to mainstream Ecological Organic Agriculture (EOA) into national agricultural production systems by 2025 in order to improve agricultural productivity, food security, market access and sustainable development in Africa.

This is to be realised through scaling up ecologically and organically sound strategies and practices through institutional capacity development, scientific innovations, market system development, public policies and programs, outreach and communication, efficient coordination, networking and partnerships in Africa.

7.8 million farmers reached

Based on the 2022 data, about 7.8 million farmers (37 percent women, 63 percent men and 28 percent youth) were reached with information and knowledge on EOA to enhance knowledge about and uptake of organic farming. Additionally, 1'256 value chain actors (transporters, input suppliers, marketers and consumers) were reached with various types of EOA information. The information and knowledge covered diverse areas, including crop management, soil fertility management, organic seed

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[4] Moses O. Aisu, African Organic Network (AfrONet), Dar-es-Salaam, Tanzania
[5] Olugbenga O. AdeOluwa, Network of Organic Agriculture Research in Africa (NOARA), c/o Department of Soil Resources Management, University of Ibadan, Nigeria
[6] The EOA Initiative (EOA-I) in Africa is a response to support and implement the African Union Council Decision on Organic Farming passed during the Eighteenth Ordinary Session, 24-28 January 2011, EX.CL/Dec.621 (XVIII).

production and management, value addition, market intelligence and organic standards and certification. The capacity of about 10'000 farmers to adopt EOA and agroecological practices was enhanced through training and field exchange events organised from the national to continental level by the EOA-I implementing partners and the executing agencies.

75 knowledge products validated

Knowledge management through developing and disseminating knowledge products is key to advancing EOA uptake. Seventy-five EOA knowledge products were validated, packaged and disseminated, covering a range of areas such as preparation of quality manure and vermicompost, value addition across various enterprises, organic standards and certification, and soil fertility management.

EOA practices promoted

Beyond knowledge of organic technologies and practices, 27'891 farmers (13'188 males, 4'906 females and 9'797 youth) adopted the EOA practices promoted. The communication pathways used to trigger uptake included knowledge databases, farmer field days, exchange visits, training events, workshops, trade fairs, social media (especially YouTube, Twitter and Facebook) and websites. The multiplier approach of training teams of facilitators, who then trained larger numbers of value chain actors, was used. This approach saw 314 master trainers train 2'629 value chain actors.

Various value chains were promoted, including herbs, honey, chia seeds, millet, sesame, vegetables (tomatoes, onions, fonio, carrots, potatoes) and fruits (plantains, bananas, pineapples and strawberries). EOA-I realised an increase in the number of farmers meeting organic market standards, with 375 farmers being facilitated to be certified, which correlated with the establishment of 40 organic markets.

Achievements at the national level

Thirty-three multi-stakeholder forums were convened to lobby for agroecology/EOA policy changes. Five-hundred-thirty stakeholders participated in advocacy and lobby forums, meetings or workshops at the national level to achieve 80 percent of the annual meetings planned for various EOA-I stakeholder groups across the nine participating countries in Eastern Africa and West Africa.

Further achievements at the national level were in related projects such as

- soil improvement and agroecology for resilient agri-food systems in Benin (ProSilience) supported by the German Agency for International Cooperation (GIZ);
- agroecological transition in zones of Benin, supported by the French Development Agency (AFD);
- IIABA - Institutional Innovations for Ecological Organic Agriculture in Africa, supported by the French Development Agency (AFD) in Tanzania;
- subsidy for organic inputs availed following the High Council of Agriculture chaired by the Head of State of Nigeria endorsing support to organic farmers and
- implementation of the National Agricultural Extension Strategy for Uganda.

Achievements at the regional level

At the regional level, EOA forums lobbied for the support of Regional Economic Communities (RECS), especially the East Africa Community (EAC) and the Economic Community of West African States (ECOWAS), to steer and lobby for the development of regional policies in support of EOA. The EOA-I currently has two active regional platforms in Western and Eastern Africa. The Central Africa regional platform was launched, and plans are underway to establish the Northern and Southern Africa platforms.

Successful policy work at the continental level

At the continental level, various forums were held, which the EOA-I secretariat participated in and contributed to policy lobbying and advocacy. Key among them was the Third Steering Group Meeting of the African Seed and Biotechnology Partnership Platform (ASBPP) held in May 2022 in Kampala, Uganda, where among others, the Farmer Managed Seed Systems (FMSS) road map drafted by the EOA-I was approved. Further, three indicators for the development of FMSS were presented by the EOA-I secretariat for inclusion into the Seed Index of the Comprehensive Africa Agriculture Development Programme (CAADP) under theme 3, titled "Ending Hunger". This was at the Third CAADP Biennial Review Cycle meeting held in August 2022 in Yaoundé, Cameroon, organised by the African Union Commission (AUC). One policy indicator capturing the status of FMSS in national seed policy instruments and institutional arrangements was approved by the forum chaired by the African Union Commission. The indicator evaluates the extent to which national seed policy instruments (seed policy, law, regulation/decree) and institutional arrangements promote an enabling environment for FMSS development.

Further, the CAADP policy framework has now mainstreamed EOA by integrating an EOA status report as annexed in the 3rd Biennial Review Report.

Despite the achievements mentioned above, various challenges limit the full realisation of favourable policy and legislation for EOA, and these include:

1) Limited resources to scale up the EOA-I to all 55 African countries and the five political regions as envisioned by the EOA Strategic Plan 2015-2025. So far, only nine countries are implementing trackable EOA activities in West and Eastern Africa.
2) Related to the above, the EOA sector is not institutionally supported as conventional agriculture is. Most of the support for the EOA sector comes from donor-funded projects and is implemented by non-governmental organisations.
3) Limited research, development and innovation on EOA in Africa adversely affect the growth and development of the EOA sector. This weakness exploited by proponents of conventional agriculture further undermines the EOA sector.

4) Adoption levels of agroecological practices are still low even though there is increased attention to agroecology-based food systems. Current food systems need to transition from heavily chemical-based practices, as demonstrated at the United Nations Food Systems Summit (UNFSS) and reinforced by the African Union Common Position on UNFSS, to sustainable and resilient systems.
5) Weak capacity of partners to establish and manage successful value chains attractive to the private sector for investment.

The Knowledge Centre for Organic Agriculture in Africa

The Knowledge Centre for Organic Agriculture in Africa (KCOA) is part of the German BMZ's[1] initiative "ONE World – No Hunger". The motivation for the project lies in the multifunctional and sustainability-enhancing nature of EOA/agroecology. These attributes lead to the following:

- They promote soil health, increase water and CO_2 storage of soils and strengthen the resilience of agricultural systems (ecological sustainability);
- they increase the availability of healthy, high-quality food in local markets, including in rural areas; employment (food security);
- they lead to organic and agroecological value chains that increase employment opportunities for the rural population, especially for youth and women; economic sustainability (employment);
- they enable sustainability through independence from synthetic fertilisers and pesticides, less dependence on fossil energies and corresponding price developments; (economic sustainability); and
- they strengthen ownership and create prospects for rural populations through collecting, processing and disseminating knowledge on EOA/agroecology (social sustainability).

The German Agency for International Cooperation (GIZ) coordinates the project, which aims to strengthen actors of the regional knowledge hubs[2] and their networks in Eastern, Southern, West, North and Central Africa in promoting organic agriculture and agroecology. West Africa has Senegal, Benin, Gambia, Mali and Nigeria; Eastern Africa has Uganda, Kenya, Tanzania, Rwanda and Madagascar. Southern Africa has Zambia, Namibia, South Africa, and Malawi; Northern Africa has Egypt, Morocco and Tunisia, while Central Africa's hub is based in Cameroon.

Three main strategies

The assemblage of the five regional knowledge hubs is being addressed through three main strategies:

[1] BMZ is the German Federal Ministry for Economic Cooperation and Development (Bundesministerium für wirtschaftliche Zusammenarbeit und Entwicklung). More information is available on https://www.bmz.de/en.
[2] For more information see https://eoai-africa.org/knowledge-hub-giz-funded-project/

- **Integrated Knowledge Management Systems Strategy:** This involves collecting, validating and preparing indigenous and scientific knowledge on the production, processing and marketing of organic products. The hubs generate content on important thematic areas, including nutrition and food security, climate change, water management, resilience and sustainability of farming systems, markets and market development, and technology transfer and learning. Communication tools include knowledge databases/websites, publications, Information Education Communication (IEC) materials, videos, ICT[1] applications and social media (Facebook, Twitter, Flickr and YouTube).
- **Dissemination and Capacity Building Strategy:** This involves adapting existing knowledge and good practices by participating countries, strengthening the competencies of multipliers and disseminating knowledge to various target groups, including farmers along the value chain based on the needs and constraints of the groups. Regional and country training programmes (Training of Teams of Trainers/Facilitators) are expected to enable the multipliers (innovators, entrepreneurs, model farmers, extension officers, etc.) to access knowledge from digital knowledge platforms and to use various tools to disseminate that knowledge to diverse target groups for putting into use.
- **Market Systems Development and Networking Strategy:** This involves working on a network with key actors of the organic value chains across the five regions to create incomes, provide services, and improve farm households' livelihoods and those of other community members. The strategy links the KCOA project to other initiatives around the African continent, such as the EOA-I, for complementarity, synergies and shared learning. The strategy aims to build the capacity and resilience of local systems, leveraging the incentives and resources of the private sector, ensuring the beneficial inclusion of the smallholder farmers and stimulating change and innovation that will grow beyond the project's life.
  A business development services approach links target groups to service providers (for inputs, marketing, training, information, technology development and transfer purposes) and makes markets work for the poor. Certification and standards within context-adapted participatory guarantee systems (PGS) and an internal control system are encouraged.[2] A value chain approach focusing on strategic value chains and the specific needs of the value chain actors is also adopted.

[1] Information and communications technology ICT

[2] A Participatory Guarantee System (PGS) is a quality assurance scheme with a local focus. It certifies producers based on active stakeholder participation and is built on a foundation of trust, social networks and knowledge exchange.

Various partners are involved – country and regional partners[1], international partners[2] and the African Union.

Multiple activities of the regional knowledge hubs

So far, the project has reached five million farmers and value chain stakeholders across Africa, connected 500 organisations in the organic sector, created 1'800 knowledge products in over 20 languages for 20 countries, assisted 1'700 businesses with PGS certification, trained 470'000 farmers and their families and trained 5'000 multipliers (including 150 master trainers) in 18 countries.

The use of the Continental Digital Knowledge Platform is growing, as shown by the data captured in Figure 58 for October 2022. The platform aims to disseminate relevant knowledge on organic agriculture and provide a space for web-based networking with international and regional organisations, initiatives and networks.

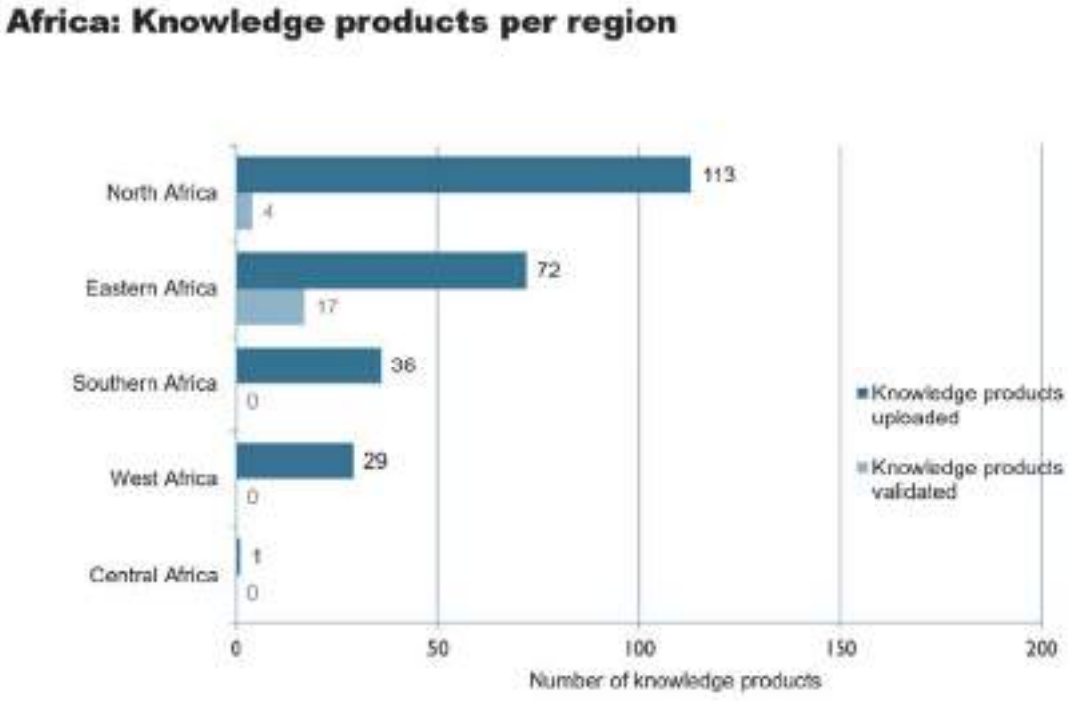


Figure 58: Africa: Knowledge products per region (status as of October 2022)

Source: GIZ (2022). Updates of the Global Project "Knowledge Centre for Organic Agriculture in Africa" (KCOA) for the 18th Continental Steering Committee (CSC) of the AU Ecological Organic Agriculture Initiative (EOA-I) December 2022

[1] Country and regional partners include non-governmental organisations, such as Biovision Africa Trust and PELUM Uganda for Eastern Africa, the Sustainability Institute for South Africa; ENDA ProNat, FENAB & Agrecol Afrique for West Africa; SAILD, GADD, Inades, CPE and CPCRE for Central Africa.

[2] International partners included organisations such as IFOAM - Organics International, Biovision Foundation, Access Agriculture, the Research Institute of Organic Agriculture FiBL and the International Centre of Insect Physiology and Ecology (ICIPE).

Africa

Some examples of initiatives by the regional knowledge hubs are worth sharing:

- In the **Knowledge Hub for Organic Agriculture in North Africa** (KHNA) framework, the Carbon Credits „Farms 4 Climate", Egypt at SEKEM[1], certifies small farms that convert to organic farming practices through a national standard. These farms' CO_2 savings and storage (about 12'000 tons CO_2 in 2021) are considered carbon credits. In Egypt, the "Farms 4 Climate" programme will be widely disseminated by the KNHA (up to 3.7 million hectares, about 80'000'000 metric tons of CO_2 per year). It will also be piloted with partners in Morocco and Tunisia.
- In the **Knowledge Hub for Organic Agriculture in West Africa** (KHWA) framework, the "Week-End Bio" (organic weekends) in Senegal is a practice of promoting organic food distribution and raising awareness about organic farming and healthy diets. So far, 142 exhibitors and 3'700 visitors have participated in such weekend events. In 2021, 23 metric tons of organic products were sold. The products are certified through Participatory Guarantee Systems (PGS) and come from 120 farms. The KHWA will also pilot the organic weekends in Mali, Benin and Nigeria.
- In the framework of the **Knowledge Hub for Organic Agriculture in Eastern Africa** (KHEA)**,** the **"**farmers' Caravan'' consists of trained farmers and multipliers who visit organic farms in different regions to exchange ideas, learn from each other and initiate a national strategy for the dissemination of organic agriculture. So far, more than 2'000 farmers and their families have been reached, 45 percent of whom were youth.
- **Knowledge Hub for Organic Agriculture in Southern Africa (KHSA):** In the framework of the ''Participatory Guarantee System (PGS) Pollinator Programme'', 20 pollinator-multipliers, 18 PGS groups and 345 farmers have been trained in South Africa. This programme has trained the multipliers to set up PGSs throughout South Africa to help build more connected local food systems, provide organic assurance for consumers and support organic growers in sharing knowledge. "The Pollinator program has helped me develop as a leader and gain more confidence in talking to people about organic agriculture. PGS connects consumers, farmers, and communities through a shared vision," says Sophia Grodes, PGS Pollinator.

The Knowledge Hub for Organic Agriculture in North Africa is leading in the knowledge products uploaded on the continental digital knowledge platform, followed by the Knowledge Hub for Organic Agriculture Eastern Africa (KHEA) (Figure 58). The KHEA has the highest number of knowledge products validated but yet to be uploaded on the platform.

1 For more information about SEKEM see www.sekem.com

Governance and institutional development

Memorandum of Understanding between Biovision Africa Trust and the African Union

In 2019, the African Union's Specialized Technical Committee (STC) on Agriculture, Rural Development, Water and Environment officially endorsed Biovision Africa Trust as the EOA-I Secretariat and agency to oversee the implementation and reporting the progress of the implementation of the Africa Union Decision on Organic Agriculture (EX.CL/Dec.621 XVII). The signing of the Memorandum of Understanding between Biovision Africa Trust and the African Union officially took place in July 2022 in Addis Ababa, graced by H.E Ambassador Josefa Sacko, the African Union Commissioner for the Department of Agriculture, Rural Development, Water and Environment (DARBE), and Dr David Amudavi, the Executive Director of Biovision Africa Trust. In her remarks, Ambassador Josefa Sacko paid tribute to Biovision Africa Trust for supporting the implementation of the EOA-I, which she said has a special niche in the production of healthy foods for the people and for protecting the environment. Further, she called for more advocacy on promoting bio-fertilizers and bio-pesticides that should result in industrial-scale production to provide alternatives to conventional fertilisers and pesticides. She noted the contribution of Biovision Africa Trust towards enhancing agricultural diversity and transformation and applauded the EOA-I secretariat's role in championing Farmer Managed Seed Systems (FMSS) within the African Seed and Biotechnology Partnership Platform (ASBPP).

Implementation of EOA in Africa: Current and future activities

The African Union-supported Continental Steering Committee (CSC) of the EOA-I continued to provide strategic guidance and patronage as regards the implementation of EOA in Africa despite the rampant COVID-19 challenges. The 17th and 18th African Union CSC meetings were held in South Africa and Kenya, respectively.

Key decisions and resolutions in 2022 were taken among them.

- the development of a continental EOA multi-stakeholder platform to be led by the EOA-I secretariat and AfrONet,
- a resource mobilisation strategy to support EOA initiatives beyond Eastern and West Africa to cover all five regions of the continent,
- the streamlining of the organisation of the Africa Organic Conference, among others.

The Continental Steering Committee also endorsed two studies to be undertaken in 2023 by Biovision Africa Trust and supported by the Swiss Agency for Development and Cooperation. The two separate studies will take stock of EOA initiatives on the continent and examine the role of youth in agroecology.

The EOA-I secretariat conducted a pilot study on the potential EOA indicators. The three earlier mentioned indicators (see section "successful policy work" in the EOA-I subchapter) have been adopted and included in the CAADP Biennial Review framework. The indicators are total agricultural land under organic fertilisers, the

proportion of EOA/Agroecology producers having access to advisory services and the share of agricultural land under EOA/Agroecology practices.

The discussion about the development of the EOA-I to cover all five political regions of Africa continued in 2022, and the African Union and its EOA-I Secretariat convened stakeholders from Southern Africa to establish the region's platform. They developed a concept note for the relaunch of the Southern Africa EOA-I regional platform in 2023. A similar meeting is planned between the African Union, the EOA-I Secretariat and the Arab Maghreb Union's Secretariat to discuss the roadmap for the establishment of an EOA-I regional platform for Northern Africa to cover Algeria, Egypt, Mauritania, Morocco and Tunisia.

Data on the status of organic agriculture

Key decisions taken by governments and other stakeholders are informed by reliable data and analysis. However, organic agriculture data in Africa remains scanty and perhaps not precise. A survey tool developed by the EOA-I CSC in collaboration with IFOAM – Organics International to support gathering relevant data on programmes and initiatives has not been applied. The tool was expected to be regularly used together with other sources of data like Ministries of Agriculture and National Bureaus of Statistics on board to harness relevant data on organic agriculture and identify gaps and opportunities for further actions. An important step in this direction was the development of some relevant indicators to monitor the performance of EOA in the continent, which was reported on in CAADP's biennial review reporting process.

This has been further elaborated by a complementary framework addressing key priority area 5 of the Policy and Programme Development of the EOA Initiative, utilising six criteria:

- the extent to which a national policy is in place and supported by a budgetary allocation;
- the extent to which organic regulations have been promulgated and implemented;
- the extent to which national standards and certification are in place;
- the extent of government support to the organic sector;
- the degree to which civil society is involved in the development of the EOA sector; and
- the performance of the domestic and export EOA market.

These criteria will be used to locate and track a country's EOA development and assess and report the multiple components of a country's developmental pathway. Processes and outcomes need to be monitored systematically to support the transition towards sustainable food production as part of sustainable development in Africa. Monitoring and evaluation indicators shall be linked to government and African Union budgets to ensure financial incentives are associated with environmentally responsible production.

A study commissioned by the African Union, Swiss Agency for Development and Cooperation and Biovision Africa Trust to take stock of EOA initiatives, programmes

and projects in Africa will also sample the five regions for Malabo-compliant[1] National Agricultural Investment Plans (NAIPs) and Regional Agricultural Investment Plan (RAIPs)[2] about the African Union Decision on organic agriculture. The process will also aid future EOA data collection and availability.

Achievements by the African Organic Network AfrONet

AfrONet, the umbrella of the African organic movements and organic sector development, aims to strengthen and support national, regional, and continental networks, overseeing the development and growth of organic agriculture in Africa. As a member of the Continental Steering Committee of the EOA Initiative, AfrONet positions itself to network with all key actors on the African continent.

Regional networks

In Southern Africa, AfrONet has reached out to the Southern African Network for Organic Development (SANOD) and IFOAM's Southern African Network (ISAN), which have been uniting organic stakeholders in the region.

Other active regional networks relevant to AfrONet are from West Africa through West Africa Organic Network (WafrONet), Central Africa and Eastern Africa National Organic Agriculture Movements/Networks (NOAMs).

AfrONet initiated the process of establishing a National Organic Agriculture Movement in Egypt through a local organisation. It is anticipated that by 2023, Organic Egypt will be transformed into a national organic movement (NOAM) to handle organic activities in Egypt and collaborate with the Moroccan Interprofessional Federation for Organic Agriculture FIMABio.Together with the organic movement in Tunisia, these NOAMs are anticipated to establish the North Africa Organic Network platform.

AfrONet memberships in 27 countries

Currently, NOAMs from 27 countries are members of AfrONet. The new AfroNet strategic plan 2023-2028 includes a roadmap for creating NOAMs in the remaining 28 countries by 2028. To drive the establishment of NOAMs in Africa, AfroNet has developed a guiding tool for the establishment/formation and strengthening of NOAMs that will be operational by 2023. AfroNet has been bringing together all the

[1] The Heads of States and Government of the African Union, who met in June 2014, in Malabo, Equatorial Guinea adopted two Decisions and two Declarations which directly relate to "Comprehensive Africa Agriculture Development Programme" CAADP and Africa's agricultural transformation and food security agenda in the 2015-2025 decade. More information about the Malabo Declaration can be found at https://www.nepad.org/caadp/publication/synthesis-of-malabo-declaration-caadp-and-other-related-au-decisions

[2] For more information see document «Synthesis of lessons learned from RAIPs and NAIPs formulation and implementation» available at https://nepad.org/sites/default/files/resourcefiles/CAADP-%20Synthesis%20of%20lessons%20learned%20from%20RAIPs%20and%20NAIPs%20formulation%20and%20implementation.pdf

networks, partners, and other stakeholders under the African Organic Conference's platform.

AfrONet assessed NOAMs across the continent regarding their viability to provide technical support to strengthen their operations. This online process helped understand critical issues and areas instrumental to the development of AfrONet's five-year strategic plan for 2023-2028. In addition, AfrONet has strengthened its partnership with IFOAM - Organics International and held several meetings to discuss how to support organic farmers through NOAMs.

The West Africa Organic Network (WAfrONet), in collaboration with the region's EOA-I secretariat, held a side event during the 1st African Organic Research Conference in Ibadan, Nigeria, from 6th to 8th December 2022. WAfrONet honoured Mr Ernest Aubee (formerly Head of Agriculture at the Economic Community of West African States Commission ECOWAS) for being a Champion of organic agriculture and agroecology in the region.

AfrONet, its partners and individual organic entrepreneurs from Tanzania, Uganda, Kenya, and Rwanda received an online seminar on Fairtrade and organic products between 27 June and 1 July 2022. The technical support was provided by the German institute, Bildungswerk der Bayerischen Wirtschaft (BBW) gGmbH. BBW has supported AfrONet since 2018, and the training events have been instrumental in building the capacity of AfrONet and its members to improve communication and the advancement of organic agriculture in Africa.

AfrONet joined a team of actors in the East African region to support organic actors in Kenya against the lifting of GMOs and engaged the British Broadcasting Corporation (BBC) on a dialogue on GMO vs organic agriculture.

5th Africa Organic Conference to be held in 2023

The 5th Africa Organic Conference planned to take place in Kigali, Rwanda, was postponed due to unavoidable circumstances. The event will, however, be held in 2023, after an extraordinary General Assembly of AfroNet meets to review overall planning and hosting of the every-three-year forum with further support of the African Union and the EOA-I Continental Secretariat. The conference will bring together all organic actors from the five political regions of Africa.

Project Innovative Institutions for Ecological Organic Agriculture in Africa IIABA

Under the project "Innovative Institutions for Ecological Organic Agriculture in Africa" (IIABA), financed by the French Development Agency (AFD) worth 1.5 million euros (running from December 2019 to October 2023), important tools have been developed, such as the standardisation of the Participatory Guarantee System (PGS) which will be cascaded to all NOAMs in Africa from 2023 onwards.

The IIABA project aims to strengthen National Organic Agriculture Movements in Tanzania, Uganda, and Morocco. Project partners include the Moroccan Interprofessional Federation for Organic Agriculture (FIMABio), the National Organic Agriculture Movement of Uganda (NOGAMU), the Moroccan Network of Agroecology Initiatives (RIAM), the Tanzania Organic Agriculture Movement (TOAM), the French

Agricultural Research Centre for International Development (CIRAD) and the French National Research Institute for Agriculture, Food, and Environment (INRAE).

A digital organic market system has been established. Currently, NOGAMU in Uganda is championing the local organic market system with the weekly organic markets in Kampala and Entebbe's metropolitan regions. In addition, AfrONet will cascade this organic market system to other NOAMs across the continent with lessons learned from Uganda.

Findings of research studies on the policy environment on agriculture by the IIABA project areas have been disseminated to Uganda, Tanzania and Morocco project operational countries. The IIABA project has also led to a revival of UGOCERT, an organic certification body operating in Uganda under the supervision of NOGAMU, which is now very vibrant in engaging different stakeholders in organic certification.

National Organic Agriculture Policy for Uganda

Other developments in Africa include special attention to the organic sub-sector by some African governments. For example, the Government of Uganda, through the Ministry of Agriculture, Animal Industry and Fisheries (MAAIF), distributed organic fertilisers after establishing the National Organic Agriculture Policy (NOAP), which was launched in the third quarter of 2021. In Uganda, many local farmers and a few companies like Marula Proteen Company are manufacturing organic fertilisers. They now realise more sales of organic fertilisers to farmers and exports as well, as a result of the Russian-Ukrainian war that has led to increased costs of synthetic fertilisers. As a result, farmers avoid expensive synthetic fertilisers and opt for organic fertilisers, which are cheaper to purchase.

The Network of Organic Agriculture Researchers in Africa (NOARA)

The Network of Organic Agriculture Researchers in Africa - NOARA (www.noara.bio) continued working on its roles, including:

- spearheading organic agriculture research, extension, training and value chains and market development;
- undertaking lobbying and advocacy on organic and ecological agriculture research at high levels;
- supporting capacity building for key players in organic and ecological agriculture across the continent;
- mobilising resources for NOARA's endeavours in promoting organic agriculture on the continent;
- providing management and administrative consultancy to like-minded programmes and partners on organic agriculture research; and
- undertaking any other functions as necessary to address NOARA's objectives.

NOARA continued to recruit new members within Africa and outside, including Europe and North America, with close to 400 members recruited from 29 countries, focusing on organic agriculture and agroecology activities in Africa. The research network published the Proceedings of the 6th West Africa Organic Conference

organized by WAfrONet in Burkina Faso in 2021 and compiled Volume 6 of the African Journal of Organic Agriculture and Ecology.

Organic Agriculture Research Agenda for Africa

Developing the demand-driven Organic Agriculture Research Agenda for Africa was advanced with a multi-stakeholder approach to improving the document's content (to be published in 2023). The publication should guide researchers, policymakers and development partners regarding research interventions on organic agriculture and agroecology in Africa.

1st African Organic Research Conference

The Continental Secretariat of NOARA organised the 1st African Organic Research Conference, held at the University of Ibadan, Nigeria, from 6 to 8 December 2022, with over 113 participants (physical and virtual), representing various stakeholders of organic agriculture and agroecology from about 19 countries, from Africa and outside Africa. The event was the maiden edition of the continental conference of NOARA. The conference participants represented researchers, farmers, journalists, policymakers and business actors. The conference witnessed the presentations of a keynote address, six lead papers, 28 scientific papers, two multi-stakeholder dialogue sessions, and one field trip. The presentations cut across different aspects of organic and agroecological agriculture, from production (crop and livestock) to business aspects. The conference, with the theme **"**Unfavourable Climate and Food Systems in Africa: Organic and Agroecology Solutions**",** came up with a call for action around the following issues:

- National governments should include organic agriculture and agroecology research in their activities through their agricultural research councils.
- The Forum for Agricultural Research in Africa (FARA) and its regional partners should include organic agriculture and agroecology research in their activities.
- Research should address the development of implements and equipment for organic agriculture and agroecology production (e.g. solar irrigation facilities) to ease labour constraints and other challenges facing smallholder farmers in Africa.
- Research into quality guarantee systems and agribusiness models supporting organic trade by the private sector and governmental and non-governmental organisations in Africa should be stepped up.
- Development partners globally should consider supporting NOARA and other like-minded research bodies to raise the level of research work into organic agriculture and agroecology research in Africa.
- Producers should be supported with technologies and innovations to conserve indigenous seeds and to ensure sustainable conversion from conventional to organic agriculture or agroecology, motivated by the demonstrated resilience and productivity-enhancing features of the later systems.

Together with the Research Institute of Organic Agriculture FiBL, NOARA continued to characterise smallholder-model organic farms in Africa based on sustainability measures using participatory approaches.

Outlook

The multiple functions and sustainable benefits of EOA, including addressing challenges of climate change, are gaining global attention. Building on scientific and practical evidence, multi-stakeholders in Africa, working in partnership with development partners, are investing in innovations and opportunities for sustainable food systems to enhance the productivity, resilience and profitability of smallholder farming systems in Africa. Investments in research, developing ecologically sustainable systems and working on markets for organic produce would guarantee sustainable food systems in Africa. Therefore, the desired food systems in Africa should be ecological, maintain ecosystem services and restore, build and maintain natural resources, particularly soil, water and biodiversity. A better future for the organic sector requires African governments, their relevant institutions, farmers, farmer organisations, development partners and the private sector to invest resources in research, policy and programmes to establish platforms for experience-sharing, learning and collaboration, thereby building the basis for poverty reduction and sustainable, long-term food and nutrition security.

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Kenya

SAMUEL NDUNGU[1] AND MARTIN NJOROGE[2]

Recent developments

Despite a sluggish economy, Kenya's organic sector has continued to thrive in recent years. Exports of organic products continue to dominate organic sector development. Also, most land under conversion is intended for export production. Kenya is well known for its production of a variety of organic fruits, nuts, essential oils, herbs, spices, coffee, tea, and flowers, which are all in high demand globally. The country's tropical climate, the location near Europe and the Middle East, plus continuously improving infrastructure make it an ideal place for cultivating and exporting these relatively high-value products.

Regarding the domestic market, established supermarkets and organic retail stores have further solidified their position and increased their organic supply, while farmers' markets selling organic products have expanded beyond the capital city of Nairobi. There has also been an increase in land used for organic farming and local consumption of organic products. Awareness and demand for organic foods have grown, particularly among middle- and upper-income groups. This trend can partly be attributed to campaigns by the Kenya Organic Agriculture Network (KOAN) to educate the public about organic food and increasing concern over the use of toxic pesticides in conventional agriculture. The sector's growth has also been aided by the implementation of the Ecological Organic Agriculture Initiative and Knowledge Hub for East Africa projects, led by Biovision Africa Trust (BVAT) and implemented by various civil society organisations.

The recent decision by the government to lift the ban on genetically modified organisms (GMOs) has given the sector some reason for concern. However, the Law Courts temporarily halted this decision after local organisations raised injunctions opposing the government's move. The cultivation of GMO crops is likely to increase costs for organic operators, as land costs are likely to increase, GMO testing might become necessary in certain crops, and access to indigenous crop varieties will involve higher costs for the need to implement biosafety standards. For the domestic market, however, the GMO debate is likely to stimulate awareness among consumers in favour of organic produce, helping to boost organic demand.

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Markets, trade and certification schemes

Kenya's organic sector remains heavily focused on exporting products, with around 90 percent of all organic products targeting the export market, primarily EU countries. Thus, EU organic certification is the most popular among certified operations, while the USDA/NOP certification for the US market is the second most popular. Other emerging markets and certification programs include Japan's JAS and China's organic standards. The most commonly exported organic products include fruits, especially avocados, nuts, macadamia, herbs, spices, and essential oils. In the local market, the most popular organic products are fruits and vegetables (99.2 percent), livestock products (0.6 percent), value-added products (0.1 percent) and cereals (0.06 percent) (see Table 49).

Table 49: Local organic product categories

Product categories	Volume [kg]	% of total
Fresh fruits and vegetables	377'808	99.2%
Livestock products	2'304	0.6%
Value added products	480	0.1%
Cereals	240	0.1%
Total	**380'832**	**100.0%**

Source: KOAN annual market survey 2022

As most organic crops for exports relate to smallholder production schemes (such as cashew and macadamia nuts, and avocados), Internal Control Systems (ICS) are widely used in Kenya. Currently, over 50'000 contracted farmers in Kenya are ICS-certified, a number that has been steadily increasing since 2007. Implementing the new EU regulation (848/2018) brings a high degree of uncertainty, as exporters will only be able to work with self-organised farmer groups that are limited in size, having a maximum of 2'000 farmers as members.

As data collection for local markets improves from year to year, the contribution of growing domestic market segments is becoming more apparent. Here, organic certification relates mainly to the Participatory Guarantee System (PGS) as stipulated in the Kilimohai Organic certification scheme, respectively, the East Africa Organic Products Standards (EAOPS)[1]. As the cost of third-party certification from local certification companies is prohibitively expensive for smallholder farmers, PGS certification is a viable option for them to access the domestic market. Currently, 1'587 farmers registered under 24 PGS covering over 1'450 hectares of land, with many more producing organic products in groups but not formally approved yet as PGS groups (Table 51). Most PGS groups started by producing fruits and vegetables for the domestic market. In the meantime, those with strong commercial partnerships have started to diversify and grow other crops that are in demand (e.g., herbs, spices, roots and tubers).

Within Kenya, supermarkets are the primary avenue for retailing organic products, with 16 stores having designated organic sections and 36 selling some organic products.

[1] Website of Kilimohai, housed under the Kenya Organic Agriculture Network – https://kilimohaikenya.org

Additionally, organic products can be purchased through over ten organic farmers markets, 18 healthy stores, nine green grocery stores, one organic restaurant, and two online marketing platforms. These platforms offer over 54 different organic product types which are seasonally available.

Sourcing, which has been the primary challenge in getting organic products to market, is continuously improving as various PGS groups, together with traders, have improved their logistics to supply greater volumes of regionally available products of good quality. Some PGS groups have also started to sell part of their organic produce in local markets and got involved in processing (e.g., drying herbs and spices). Both have helped to reduce logistical challenges, which remain together with supply quality, the main challenge for further organic market development within Kenya.

Table 50: Kenya: Development of organic local market and exports

Year	Local market sales value (Kenyan Shillings[1])	Export market value (Kenyan Shillings)
2008	-	22'025'882.35
2009	-	31'373'725.49
2010	-	49'162'009.80
2011	-	126'944'313.73
2012	-	174'367'760.00
2013	-	210'784'313.73
2014	-	238'823'529.41
2015	-	288'235'294.12
2016	-	306'960'784.31
2017	-	362'407'407.41
2018	-	360'714'285.71
2019	123'660.00	399'130'434.78
2020	1'524'168.00	466'034'482.76[2]
2021	3'679'289.00	–
2022	6'272'739.00[3]	–

Source: KOAN annual market surveys 2008-2022

Legislation and sector support

The process of developing a National Organic Agriculture Policy in Kenya began in 2010 when KOAN, together with other actors, developed a working group with the Ministry of Agriculture Policy Department. The aim was to develop a legal framework to guide the organic sector's development. Yet, the development of this policy faced several challenges, going hand in hand with structural changes within the Ministry of Agriculture, implying limited government commitment to define and support sound measures with its own budget and staff. The implementation of the Ecological Organic Agriculture Initiative in 2012 has improved networking and provided a platform for more engagement with the Ministry of Agriculture and other non-state actors. Since 2019, the government has increased its commitment again by kick-starting the development of an organic agriculture strategy led by the Intersectoral Forum for

[1] One Kenyan Shilling corresponded to approximately 0.00747865 euros in 2022.
[2] Approximately 3.5 million euros.
[3] This corresponded to about 47'000 euros.

Agroecology and Agribusiness (ISFAA), which is chaired by the Ministry of Agriculture, Livestock, and Fisheries (MOALF) and includes participation from non-state actors and relevant government departments. Currently, the process is continuing with a work plan implemented in the third quarter of 2022. The ministry is still seeking support from participating organisations due to budgetary constraints to finance the process.

At the county government level, significant strides have been made in promoting organic agriculture. In November 2022, Murang'a County Government signed the Murang'a Agroecology Bill 2022 into law, which includes provisions such as setting aside at least 10 percent of the county's agriculture budget to support organic agriculture and establishing an Organic Agriculture Board to advise on the development of organic agriculture matters. Murang'a County was one of the first to recognise the importance of organic agriculture. It had already started a subsidy program for organic fertilisers in 2015, leading to a significant increase in horticultural and fruit production. Other counties, including Kiambu and Busia, are also in the process of developing agroecology policies as a means to promote and support organic agriculture through tangible measures.

Most support to the organic sector in Kenya is channelled through the Kenya Organic Agriculture Network (KOAN) and local NGOs supporting individual organic farmer groups. KOAN was founded as a membership organisation in 2005. Its membership includes farmer groups, associations, community-based organisations, NGOs, traders, exporters, organic input suppliers, service providers, organic consumer lobby groups and parastatals. KOAN is governed by an elected board from its membership and has a secretariat to implement its activities. Its mission is to lead, coordinate and foster public exposure to the National Ecological Organic Agriculture Sector while revealing its importance in generating relevant economic, environmental and social benefits. KOAN's services include capacity development, providing advisory, creating linkages and market support, lobbying and advocating for pro-organic policies, consumer awareness and education and guiding in organic standards and certification. For instance, in partnership with local NGOs and as the National Coordinating Body for PGS, KOAN is engaged in capacity-building activities among PGS groups and along different value chains. Thereby, a significant share of these activities are supported by international project funding, especially from Switzerland and Sweden. These have allowed KOAN to support the organic sector beyond the possibilities that membership fees would allow.

Currently, in partnership with FiBL Switzerland, two complementary projects are running that aim to significantly strengthen the organic sector in Kenya with a strong market-oriented focus: "Accelerating the Organic Market Development in Kenya"[1] and

[1] Project Accelerating the Organic Market Development in Kenya – https://www.fibl.org/en/themes/projectdatabase/projectitem/project/2168

"Organic Influencer Marketing – Improving Market Access for Farmers and Strengthening Demand for Organic Products through Social Media in Kenya".[1]

Organic extension services are implemented by varying actors. However, public organic extension is very limited. As the responsibility for agriculture extension services was transferred to county governments, only those counties engage in such activities where there is an interest in promoting organic agriculture, especially for export. Thus, most training and extension services are provided by non-state actors.[2]

Organic research is minimal and relates to special project funding, as the government currently provides no specific support. Yet, as part of FiBL's SysCom Program[3], the Kenya Agriculture and Livestock Research Organization (KALRO), in partnership with the Institute of Insect Physiology and Ecology (ICIPE) based in Kenya, has been conducting long-term trials comparing organic and conventional systems with some study results already published and more expected in the future. Universities, such as Egerton University, have also contributed to participatory trials focused on validating organic farming technologies and indigenous knowledge, mainly through the Ecological Organic Agriculture Initiative (EOA-I).[4] In addition, a significant amount of relevant research on organic agriculture has been collected and collated through various partners. Databases have been developed to make this information available, including the saferinputs.koan.co.ke database, which promotes integrated pest management and helps farmers identify potential risks from synthetic chemical active ingredients while providing safer alternatives. The CABI crop protection compendium and bioprotection portals also provide similar services, recommending off-the-shelf organic solutions for common pests and diseases.

Outlook

The excellent production conditions for a wide range of organic products coupled with the proximity to the European and Middle East markets, the steadily improving infrastructure and the growing interest from the side of domestic consumers are all factors that further stimulate the organic sector in Kenya.

Similar to other countries in the South, the export-oriented organic sector will be challenged by the new EU regulation (848/2018), implying important changes in conceptualising contract farming with smaller and self-organised ICS farmer groups. This may lead to a reduction of the export volume in some cases while favouring the implementation of own plantations, but which will delay the delivery of produce. Yet, as logistics within the country will be further improving and importers are keen to

[1] Project Organic Influencer Marketing – Improving Market Access for Farmers and Strengthening Demand for Organic Products through Social Media in Kenya – https://www.fibl.org/en/themes/projectdatabase/projectitem/project/2019

[2] Not state actors include such as the Kenya Organic Agriculture Network KOAN, Biovision Africa Trust, PELUM Kenya, SACDEP Kenya, Kenya Institute of Organic Farming (KIOF), YARD, Community Sustainable Agriculture and Healthy Environment Program CSHEP, Africa Centre for Energy Policy ACEP, Baraka Agriculture College and Manor House Agriculture College.

[3] Farming Systems Comparison in the Tropics https://systems-comparison.fibl.org/

[4] Website of the Ecological Organic Agriculture Initiative https://eoai-africa.org/

lower shipment distances and the carbon footprint, Kenya is likely to increase its competitiveness for organic production compared to competing countries in the region and South America – especially with foreign investors making the needed funds and knowhow available for such development.

For the further development of the domestic market, sound value chain development will remain the focus of attention to balance demand and supply as both are likely to expand in terms of volume and number of products. Thus, the need for mechanisms to facilitate a functional exchange of different organic sector stakeholders will grow, with KOAN in the pole position to respond to this demand. With the increased consumer awareness and the growing demand for organic produce, different markets need to be the focus: supermarket retail, online shopping platforms, and organic farmers markets. The ever-increasing demand for organic produce from consumers is likely also to stimulate imports of organic products, which is currently still very low, with approximately 1 percent. This is likely also to create new trading opportunities with neighbouring countries, e.g., Uganda, Tanzania and Rwanda, who work with the same PGS certification system, respectively, the "Kilimohai Organic" label.

Given the high share of smallholders involved in organic production in Kenya, strengthening both ICS and PGS-certified farmer groups will remain a key priority for both export and domestic organic market development. This calls for further public and private support to enhance organisational and technical capacities among farmer groups and their lead farmers. Yet, such support must be well conceptualised and implemented for effective empowerment, i.e., in the form of networking events that provide space for mutual learning and interactions and new promising partnerships. As an umbrella organisation in the organic sector, KOAN will play a key role while making sure that public actors are getting more engaged and committed in this development pathway. Organic sector statistics will be made available to nurture such interactions and sound decision-making at different levels.

Weblinks

- Kenya Ecological Organic Agriculture Sector Strategy (2018-2023) – https://www.koan.co.ke/eoa-sector-strategic-plan/
- Organic Directory – www.koan.co.ke
- KOAN institutional profile – https://www.koan.co.ke/koan-profile/
- KOAN website «Replacing Harmful Agricultural Practices in Kenyan Market with Less Toxic Alternatives" – www.saferinputs.koan.co.ke
- Kilimohai Organic – Kenya Organic Agriculture Network (KOAN) – https://kilimohaikenya.org
- CABI Biocontrol and biopesticide products – BioProtection Portal – https://bioprotectionportal.com
- CABI Digital Library – https://www.cabidigitallibrary.org/

Acknowledgement

This article was elaborated in the framework of the project 'Accelerating the Organic Market Development in Kenya', which is being implemented by KOAN together with FiBL Switzerland; the project is jointly funded by the Leopold Bachmann Foundation and Biovision Foundation, both based in Switzerland. The PGS development in Kenya has been supported by the Swedish Society for Nature Conservation (SSNC) through the Ecological Organic Agriculture Initiative (EOAI) and the Sustainable Supply for Organic Fruits and Vegetables Project.

Table 51: Registered PGS groups in Kenya

Group	Members	County	Land size (hectares)	Main Product	Status
Langa women organic self help group	16	Nakuru	12.1	Fresh Vegetables and fruits	Registered – Still under development (Not Approved)
KAMICHA -KOBONDO	25	Kisumu	21.4	Cassava	Registered and Approved
MALANDO	349	Nakuru	706.2	Honey	Registered and approved
MAISHA BORA ORGANIC	15	Muranga	9.3	Chamomile, honey, vegetables	Registered – Still under development (Not Approved)
RUMA ORGANIC FARMERS ASSOCIATION	30	Homabay	60.7	Peanut Butter, grain amaranth	Registered and Approved
MUKIKA	32	Tharaka Nithi	26.3	Chicken	Registered and approved
GACABARI	18	Embu	6.1	Chicken	Registered – Still under development (Not Approved)
YETANA W.G	27	Bungoma	13.4	Banana and butternut	Registered and Approved
Ngong Organic Farmers Association	46	Kajiado	36.4	Fresh Vegetables and fruits	Registered and Approved
Maria Clara	98	Nakuru	59.1	Dairy	Registered – Still under development (Not Approved)
Kanyodero Women Group	46	Migori	20.2	Peanut butter	Registered and Approved
INNOGOF	18	Nairobi	8.9	Fresh Vegetables and fruits, herbs, value added products	Registered and Approved
Baraka PGS groups	97	Baringo	72.8	Honey	Registered and Approved
ISEMBE FAT	40	Kakamega	32.4	Indigenous vegetables	Registered and Approved
ORON CBO	32	Baringo	20.2	Honey	Registered and Approved
Mbanga pgs	191		76.9	Fresh Vegetables	Registered – Still under development (Not Approved)
Ololo Pgs GROUP	26	Kajiado	42.1	Fresh vegetables, poultry and honey	Registered – Still under development (Not Approved)
SOFA GROUP	30	Machakos	36.4	Fruits(Mango,pawpaw and passion)	Registered and Approved
Thogoto Organic group	16	Kiambu	4.9	Fresh Vegetables	Registered – Still under development (Not Approved)
3000 Nooya	25	Kajiado	8.1	Fresh Vegetables	Registered and approved
Muranga Organic Farmers Cooperative society	190	Muranga	79.3	Fresh Vegetables, Fruits, Tubers and Dried Herbs	Registered and approved
Machakos Organic Farmers Cooperative society	185	Machakos	80.9	Fruits, Vegetables, dried herbs and spices	Registered and approved
Kabare Organic farmers	20	Kirinyaga	8.1	Fresh Vegetables, Roots and tubers	Registered and approved
Kikuyu Organic Farmers Market	15	Kiambu	8.1	Fresh Vegetables, dried herbs and spices	Registered and approved
Totals	1'587		1'450.4		

Source: KOAN annual PGS survey 2022

Organic Agriculture in Africa: Key Facts and Figures

JAN TRÁVNÍČEK[1], BERNHARD SCHLATTER[2] AND HELGA WILLER[3]

In 2021, the organic sector's development in Africa was characterised by continued growth in all key indicators.

Nearly 2.7 million hectares of farmland were organic in Africa in 2021 – Uganda had the largest area

In Africa, nearly 2.7 million hectares were managed organically in 2021. Almost 3.5% of the world's organic farmland was in Africa. With more than 505'000 hectares, Uganda had the largest farmland area under organic management, followed by Ethiopia (over 332'000 hectares), Tanzania (almost 287'000 hectares) and Tunisia, formerly the country with the largest organic farmland area in Africa (over 279'000 hectares). More than half of Africa's organic farmland was in these four countries.

African organic farmland increased by more than 392'903 hectares

Organic land increased by more than 392'903 hectares in Africa in 2021, representing an increase of 17.3 per cent. In the decade 2012 to 2021, organic farmland grew by 133 per cent and thus at a faster rate as global organic farmland.

Sao Tome and Prince is the country with the highest organic area share in Africa

Organic farmland in Africa constituted 0.2 percent of the total agricultural land of the continent and was thus below the global organic area share of 1.6 percent in 2021.

The country with the highest organic area share was Sao Tomé and Principe, with an impressive share of 21.1 percent, thus making it on the world list of 20 countries with an organic area share of more than 10 percent of total farmland (and one of the six countries with a higher area share of 20 percent). Sao Tomé and Principe was followed by Sierra Leone and Réunion, which both had an organic farmland share of at least 4 percent.

Key crops grown are coffee, textile crops, and cocoa

Almost two thirds of the organic farmland in Africa is for permanent crops (1'747'781 hectares). Among the key crops was coffee (313'325 hectares), mainly from Ethiopia, cocoa (287'655 hectares) mainly from Sierra Leone and olives (264'445 hectares) mainly from Tunisia.

Arable land accounted for approximately 30 percent of total organic land in Africa in 2021. Among the key crops were textile crops (303'936 hectares) mainly from Tanzania, oilseeds (219'851 hectares) mainly from Togo, and root crops (65'939 hectares).

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[1] Jan Trávníček, Czech Organics, Staré Město, Czech Republic, www.czechorganics.com
[2] Bernhard Schlatter, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[3] Dr. Helga Willer, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org

Organic producers, processors and importers: Data situation not satisfactory

There were more than 1'123'000 organic producers in Africa, with the largest numbers in Uganda (more than 400'000). Almost one-third of the world's organic producers were in Africa. Compared to 2020, over 155'000 (16 percent up) organic producers were counted, mainly due to the fact the updates were received for Uganda as well as for all countries where Ecocert Southern Africa is active. However, not all certifiers – who are the main source for data from Africa - provide data on the number of individual producers; hence it may be assumed that the number of producers is higher than the number shown in this report. A total of 1'011 exporters and 1'739 processers were counted. Again, reporting is not consistent over the years, and the data is not complete.

Retail sales: Data almost non-existent

Organic retail sales for Africa do not exist. Kenya is the only country that provides data occasionally. This does, however, not mean that there is no domestic market for organic products in Africa. Many countries have developed local markets.

Organic exports – strong growth

While data on the domestic market are almost not non-existent, data on organic export volumes in metric tons to the European Union, which is the major export market for Africa, has been available since 2018. Export data to the US has been available even for longer (since 2014) but are less significant (7 percent of EU/US organic export in 2021) and do not cover all export products.

Data show that in 2021 almost 460'000 metric tons of products were exported from Africa to the EU and US, constituting 10 percent of all organic exports to these countries/trade blocks. In the 4-year period 2018 to 2020, African exports increased by almost 60 percent, thus considerably faster than global organic exports to the EU and US, which grew by only 5 percent in the same period.

Togo is the largest exporter

The largest African exporter was Togo (more than 72'000 metric tons of products, half of it soybeans), followed by Tunisia (68'000 metric tons, mainly olive oil) and Egypt (52'000 metric tons, mainly potatoes and onions).

Soybeans are the most important export product

With more than 93'000 metric tons and more than 20 percent of the African organic exports, soybeans and soybean products was the most important product group, followed by oils (63'000 metric tons, mainly olive oil) and bananas (44'000 metric tons).

Conclusion

Especially the export data show that organic agriculture in Africa is on strong growth path. The data also show a major need for better data, as facts displayed in the export data do not always reflect what is found in the area data. A major problem is the lack of organic data for organic operators, in particular for organic farmers working in ICS.

For more information about organic in Africa see figures and data tables on the following pages.

Organic Agriculture in Africa: Graphs

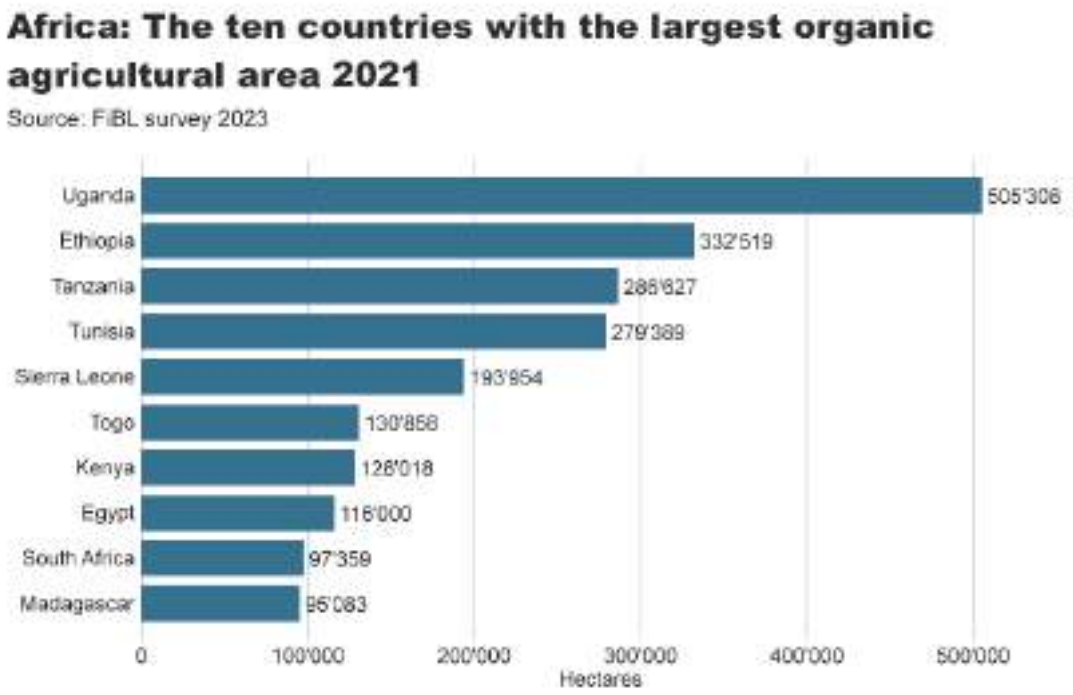


Figure 59: Africa: The ten countries with the largest organic agricultural area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

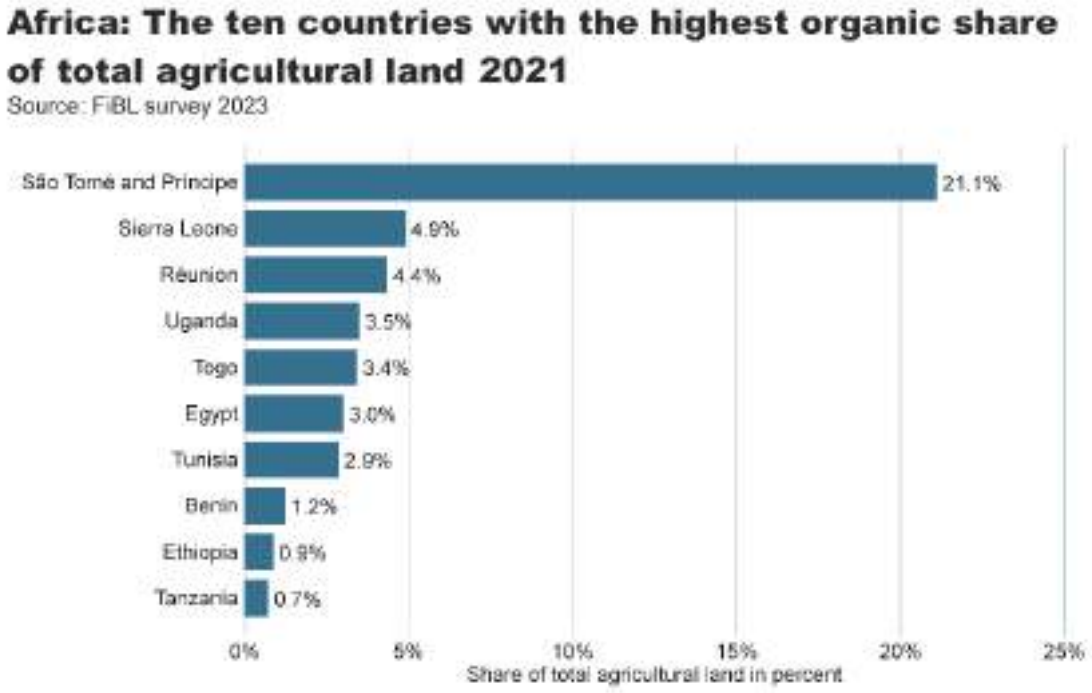


Figure 60: Africa: The countries with the highest organic share of total agricultural land 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

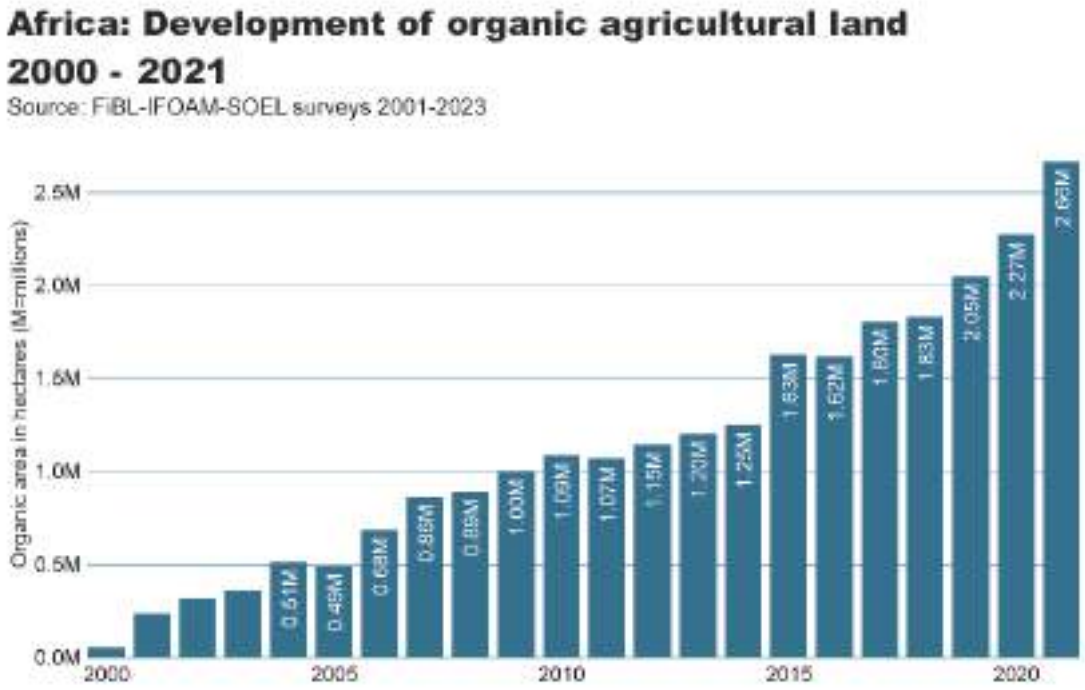


Figure 61: Africa: Development of organic agricultural land 2000-2021

Source: FiBL-IFOAM-SOEL-surveys 2001-2023

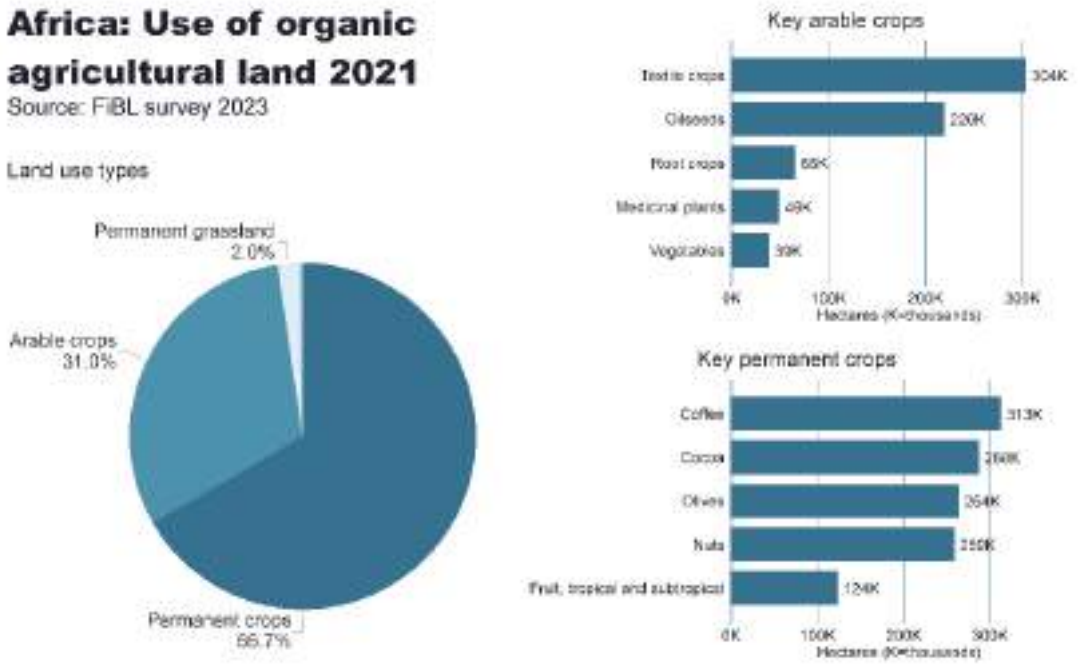


Figure 62: Africa: Use of organic agricultural land 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

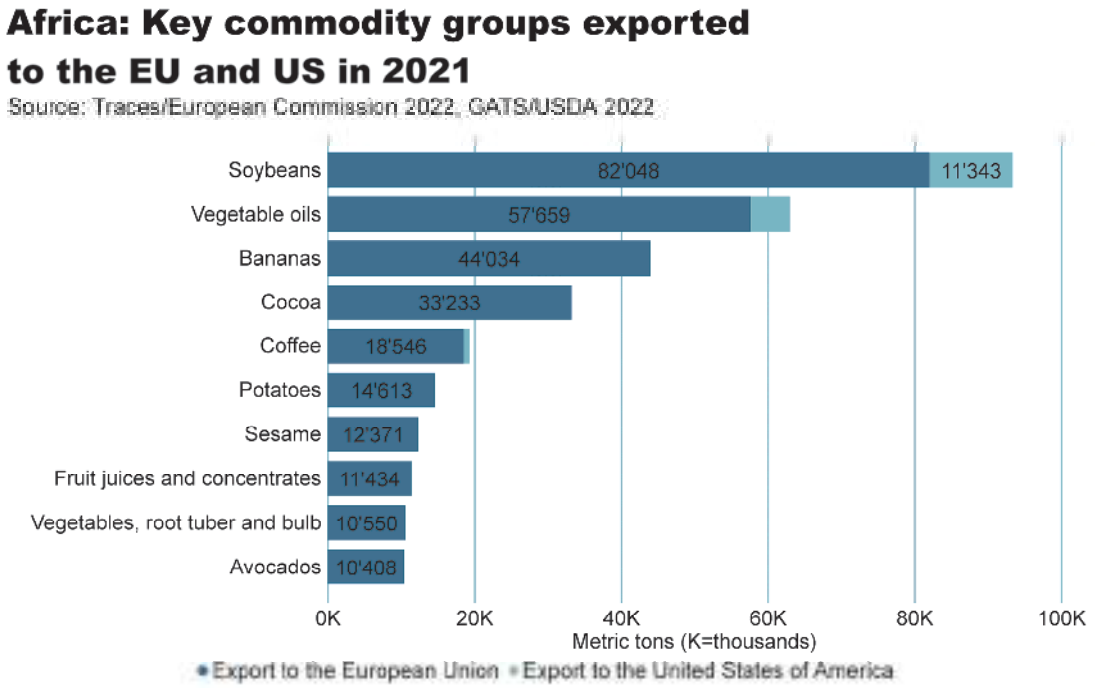


Figure 63: Africa: Commodities exported to the EU and US (export volume in MT)

Source: TRACES/European Commission, GATS/ USDA, compiled by FiBL. For detailed data sources, see annex, page 338

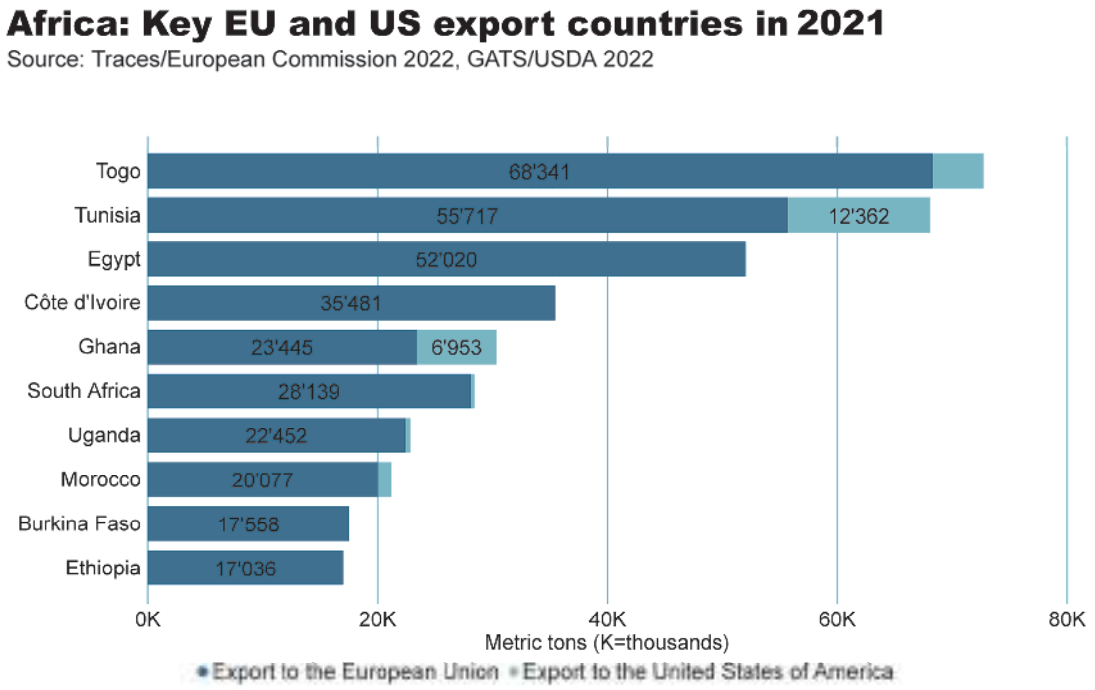


Figure 64: Africa: Key countries exporting to the EU and US (export volume in MT)

Source: TRACES/European Commission/GATS USDA, compiled by FiBL. For detailed data sources, see annex, page 338

Organic Agriculture in Africa: Tables

Table 52: Africa: Organic agricultural land, organic share of total agricultural land and number of organic producers 2021

Country	Area [ha]	Share of total agri. land [%]	Producers [no.]
Algeria	772	0.0%	64
Benin	48'898	1.2%	9'046
Burkina Faso	79'285	0.7%	27'021
Burundi	549	0.0%	668
Cameroon	1'594	0.0%	632
Comoros	937	0.7%	637
Côte d'Ivoire	78'783	0.4%	2'990
Democratic Republic of the Congo	89'486	0.3%	94'718
Egypt	116'000	3.0%	970
Eswatini	3'539	0.3%	3
Ethiopia	332'519	0.9%	218'175
Ghana	38'260	0.3%	3'433
Kenya	128'018	0.5%	44'565
Liberia	2'791	0.1%	
Madagascar	95'083	0.2%	61'974
Malawi	324	0.0%	3
Mali	17'840	0.0%	11'608
Mauritius	13	0.0%	1
Mayotte	114	0.6%	9
Morocco	11'452	0.0%	423
Mozambique	41'048	0.1%	1'358
Namibia	384	0.0010%	15
Nigeria	58'028	0.1%	2'308
Réunion (France)	2'100	4.4%	427
Rwanda	4'696	0.3%	8'930
Sao Tome and Principe	9'291	21.1%	4'201
Senegal	3'262	0.0%	18'372
Sierra Leone	193'954	4.9%	5'507
South Africa	97'359	0.1%	1'307
Sudan	960	0.0%	1
Tanzania	286'627	0.7%	148'607
Togo	130'858	3.4%	19'709
Tunisia	279'389	2.9%	7'101
Uganda	505'308	3.5%	404'246
Zambia	3'376	0.0%	10'872
Zimbabwe	1'085	0.0%	10'379
Total	**2'663'983**	**0.2%**	**1'123'255**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338
**Total number includes data for countries with less than three operators.*

Table 53: Africa: Land use in organic agriculture 2021

Land use	Crop group	Area [ha]
Agricultural land and crops, no details		42'473
Arable land crops	Cereals	16'510
	Dry pulses	3'563
	Fallow land	14'885
	Fallow land, crop rotation	447
	Flowers and ornamental plants	15

Land use	Crop group	Area [ha]
	Fresh vegetables and melons	38'881
	Industrial crops	98
	Medicinal and aromatic plants	49'425
	Oilseeds	219'851
	Plants harvested green	10'757
	Root crops	65'939
	Seeds and seedlings	4
	Strawberries	976
	Sugarcane	7'540
	Textile crops	303'936
	Arable crops, other	79'160
Arable land crops total		811'988
Other agricultural land		9'537
Permanent crops	Berries	864
	Citrus fruit	7'204
	Cocoa	287'655
	Coconut	4'069
	Coffee	313'325
	Fruit	10
	Fruit of temperate climate zones	3'345
	Fruit, tropical and subtropical	124'114
	Fruit/nuts/berries	16
	Grapes	5'129
	Medicinal and aromatic plants, permanent	64'342
	Nurseries	3
	Nuts	259'006
	Oleaginous fruits	15'855
	Tea/mate, etc.	24'280
	Permanent crops, other	173'869
Permanent crops total		374'118
Permanent grassland		52'197
Total		**2'663'980**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Table 54: Africa: Land use in organic agriculture 2021 by country

Country	Arable land crops	Permanent crops	Permanent grassland
Algeria		772	
Benin	18'940	15'391	
Burkina Faso	10'641	68'644	
Burundi	361	188	
Cameroon	66	1'528	
Comoros	347	590	
Côte d'Ivoire	181	78'602	
Democratic Republic of the Congo	1'665	87'821	
Egypt	96'484	19'003	459
Ethiopia	21'072	291'499	
Eswatini	3	3'463	73
Ghana	10'137	28'123	
Kenya	10'901	117'117	
Liberia		2'791	
Madagascar	8'777	85'846	312
Malawi	213	111	
Mali	14'240	3'601	
Mauritius	7	6	

Country	Arable land crops	Permanent crops	Permanent grassland
Mayotte	97	14	1
Morocco	1'969	9'484	
Mozambique	35'797	5'031	
Namibia	343	37	
Nigeria	55'183	241	
Réunion (France)	1'208	688	196
Rwanda	106	4'590	
Sao Tome and Principe		9'291	
Senegal	571	2'691	
Sierra Leone		193'954	
South Africa	14'771	24'170	51'155
Sudan		960	
Tanzania	243'284	43'328	
Togo	113'188	12'382	
Tunisia	5'793	271'702	
Uganda	141'486	363'821	
Zambia	3'375	1	
Zimbabwe	784	301	
Grand Total	**811'988**	**1'747'781**	**52'197**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Table 55: Africa: All organic areas 2021

Country	Agriculture [ha]	Forest [ha]	Wild collection [ha]	Other non agri. land [ha]	Total [ha]
Algeria	772				772
Benin	48'897				48'897
Botswana			6'380		6'380
Burkina Faso	79'285		87'760		167'045
Burundi	549				549
Cameroon	1'594		4'600		6'194
Chad			808'806		808'806
Comoros	937				937
Côte d'Ivoire	78'783				78'783
Democratic Republic of the Congo	89'486				89'486
Egypt	116'000				116'000
Eswatini	3'539				3'539
Ethiopia	332'519		7'163		339'682
Ghana	38'260		142'232		180'493
Kenya	128'018		355'530		483'548
Lesotho			1'551'891		1'551'891
Liberia	2'791				2'791
Madagascar	95'082	218	3'235		98'535
Malawi	324				324
Mali	17'840		14'795		32'635
Mauritius	13				13
Mayotte	114				114
Morocco	11'452		335'306		346'759
Mozambique	41'048		1'842'285		1'883'333
Namibia	384		2'313'989	24	2'314'397
Nigeria	58'028				58'028
Réunion (France)	2'100	74	2		2'176
Rwanda	4'696				4'696

Country	Agriculture [ha]	Forest [ha]	Wild collection [ha]	Other non agri. land [ha]	Total [ha]
Sao Tome and Principe	9'291				9'291
Senegal	3'262		15'258		18'520
Seychelles			1'223		1'223
Sierra Leone	193'954				193'954
Somalia			1'364'697		1'364'697
South Africa	97'359	137	991'562	1	1'089'058
Sudan	960		98'044		99'004
Tanzania	286'627		2'762		289'389
Togo	130'858				130'858
Tunisia	279'389	41'366			320'755
Uganda	505'307		66		505'373
Zambia	3'376		2'500'000		2'503'376
Zimbabwe	1'085		308'850		309'935
Total	**2'663'980**	**41'795**	**12'756'436**	**25**	**15'462'235**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338

Table 56: Africa: Use of wild collection areas 2021

Land use	Area [ha]
Bee pastures	2'501'638
Coffee, wild	6'442
Medicinal and aromatic plants, wild	103'775
Nuts, wild collection	812'291
Fruit, wild collection	2'002'082
Oil plants, wild collection	33'677
Medicinal and aromatic plants, wild collection	2'501'929
Rose hips, wild collection	2'412'936
Marula, wild collection	10'000
Wild collection, no details	2'356'527
Total	**12'756'436**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 57: Africa: Organic exports to the EU and US by country

Country	Export to EU and USA [MT]
Algeria	2'919
Angola	9
Benin	7'708
Botswana	0.3
Burkina Faso	17'558
Burundi	73
Cameroon	288
Chad	610
Comoros	42
Côte d'Ivoire	35'481
Democratic Republic of the Congo	12'608
Djibouti	18
Egypt	52'073
Ethiopia	17'036
Ghana	30'398

Country	Export to EU and USA [MT]
Guinea	44
Guinea-Bissau	426
Kenya	9'749
Lesotho	793
Madagascar	6'947
Malawi	3'566
Mali	4'736
Mauritius	296
Morocco	21'246
Mozambique	5'311
Namibia	14
Niger	700
Nigeria	906
Rwanda	730
Sao Tome and Principe	4'888
Senegal	2'891
Seychelles	24
Sierra Leone	16'236
Somalia	59
South Africa	28'450
Sudan	4'997
Tanzania	4'788
Togo	72'731
Tunisia	68'079
Uganda	22'866
Zambia	93
Zimbabwe	314
Total	**458'702**

Source: TRACES/European Commission/GATS USDA, compiled by FiBL. For detailed data sources, see annex, page 338

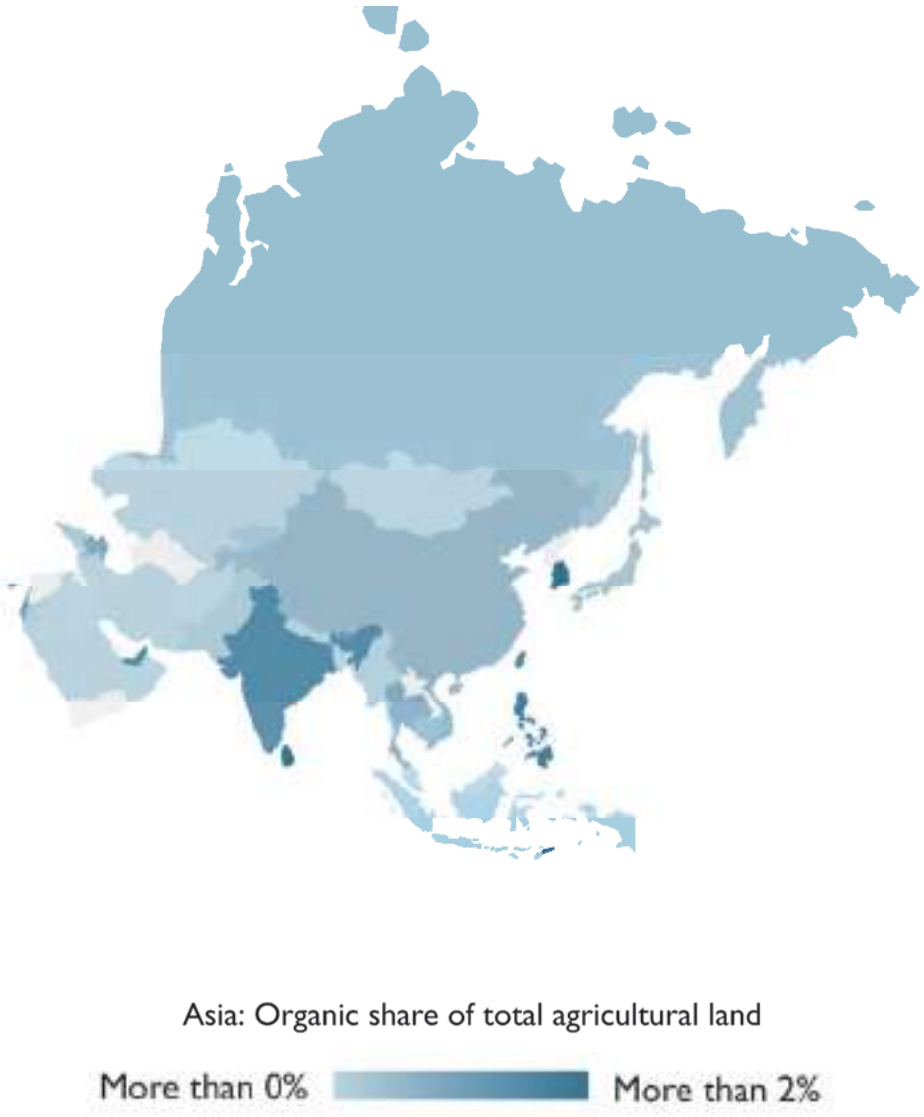
Table 58: Africa: Organic exports to the EU and US by product group group

Product group	Export to EU and USA [MT]
Aquaculture products	1'615
Bee products	280
Berries	627
Beverages	1'111
Cereals	126
Citrus fruit	16'485
Cocoa	33'233
Cocoa, chocolate and sugar confectionery	32
Cocoa, chocolate and sugar confectionery, no details	129
Coconut	3'425
Coffee	18'784
Dry pulses and protein crops for the production of grain	151
Feedstuffs	90
Fish and fish products	217
Flowers and ornamental plants	9
Food additives	950
Fresh vegetables and melons	19'601
Fruit	83
Fruit of temperate climate zones	63
Fruit, berries and nuts, prepared and preserved	24'460
Fruit, tropical and subtropical	77'737

Product group	Export to EU and USA [MT]
Grain mill products	882
Grapes	3'433
Hot beverages (Coffee, tea and cacao etc.)	1'244
Inputs	2
Medicinal and aromatic plants	2'708
Medicinal and aromatic plants, permanent	1'324
Mushrooms, prepared and preserved	0
Non-food products	8'671
Noodles, couscous, etc.	15
Nuts	5'820
Oilseeds	109'969
Olives	8'191
Other food products and product groups	17
Permanent crops, other	5'582
Prepared food, no details	97
Processed and prepared fruits and vegetables	4'924
Root crops	15'474
Seaweed	1
Seeds and seedlings	2'685
Spices and aromatics	1'230
Strawberries	197
Sugar	9'408
Sugarcane	1
Tea/mate, etc.	59
Vegetable and animal oils and fats	72'289
Vegetables, prepared and preserved	5'272
Yeast and other single cell micro-organisms	1
Total	**458'702**

Source: TRACES/European Commission/GATS USDA, compiled by FiBL. For detailed data sources, see annex, page 338

Asia



Map 3: Organic agricultural land in the countries of Asia 2021

Source: FiBL survey 2023 based on information from the private sector, certifiers, governments, and the Mediterranean Organic Agricultural Network (MOAN) for the Mediterranean countries
For detailed data sources, see annex, page 338

Developments in the Organic Sector in Asia in 2022

COMPILED BY IFOAM ORGANICS ASIA[1]

The year 2022 continued the increasing developments in the organic sector throughout the Asian region. It was evident from the contributing countries that organic activities are resuming after a few years of the COVID-19 pandemic.

In China, the Ministry of Agriculture and Rural Affairs issued the Implementation Plan of the "14th Five-Year Plan for National Economic and Social Development of the People's Republic of China and the Outline of Long-term Goals for 2035". The Plan proposes to improve the green agricultural standard system and strengthen the certification management of green food, organic products, and geographical indication of agricultural products. The 15th Biofach China held in 2021 noted a 50 percent increase in the number of participating companies from the previous year.

The recognition of Participatory Guarantee Systems continued in India, Indonesia, Kyrgyzstan, the Philippines and Vietnam, addressing the need of the domestic markets. In India, more than one million hectares of agricultural land have been brought under PGS[2] certification, with an estimated crop production of 0.8 million metric tons. In Kyrgyzstan, a regulation on the certification system was developed, including certification under PGS. In the Philippines, the 2020 Republic Act 11511 approved the accreditation of the first Participatory Guarantee System organic certification body from Tublay, Benguet.

Japan saw the launch of the "Organic Village" project by the Ministry of Agriculture, Forestry and Fisheries (MAFF) to stimulate the growth of the organic share to 25 percent by 2050. In addition, local organic groups and NGOs initiated discussions on using organic food ingredients in school meals.

Similarly, IFOAM Organics Asia also successfully hosted the "1st International Conference on School Meals and Public Procurement" in cooperation with the Global Alliance of Organic Districts and the new Taipei City Government.

Vietnam saw an increase in the number of local governments implementing organic agriculture from 46 in 2018 to 57 in 2021. It is estimated that in 62 provinces, organic agriculture was practiced.

Bangladesh

There has been an increasing demand for organic products, mainly spices, vegetables, dried fish, and chicken eggs. Some young entrepreneurs have started producing and marketing dried fish following organic practices. "Purity" organic dried fish is now widely marketed in Bangladesh with the technical cooperation of the Bangladesh

[1] For list of authors see end of article.

[2] PGS = Participatory Guarantee System. For more information see PGS chapter in this book.

Fisheries Research Institute (BFRI). Nutrition-enriched organic eggs are marketed by Rahmania Organic Agro, which are tested and certified by the Bangladesh Council of Scientific and Industrial Research (BCSIR).

Organics Nutrition Limited, an IFOAM member, initiated an interesting organic functional food research and business. The product, "Karkuma," the first functional food product certified by USDA Organic, is now marketed domestically and in the process of exporting abroad. Another notable development in the organic sector is the formation of a private certification body, "Organic Certification Bangladesh" (OCB), now under the approval stage from the Bangladesh Accreditation Board (BAB). It will help secure the organic integrity of the products for the domestic market.

Urban organic agriculture has also been steadily increasing, with many urban dwellers taking up rooftop gardening with the technical support and advocacy by associations like "Green Bangladesh." Local government agencies such as Dhaka City Corporations (North and South) give tax waiver incentives for such practitioners. In addition, digital solutions for organic food traceability and supply chain management, such as SourceTrace, Permeeda and app-based platforms on recycling waste management and organic fertiliser, seem promising interventions and initiatives in the organic sector.

China

The Ministry of Agriculture and Rural Affairs issued the Implementation Plan of the "14th Five-Year Plan for National Economic and Social Development of the People's Republic of China and the Outline of Long-term Goals for 2035". The plan proposes to improve the green agricultural standard system and strengthen the certification management of green food, organic products and geographical indication of agricultural products.

By the end of 2022, 105 certifiers were officially registered, and 75 certifiers issued organic certificates in 2021. To improve the organic product certification system and standardise the use and management of organic product certificates and marks, CNCA[1] has revised the Certificate Numbering Rules and Certification Mark Coding Rules in the annexe to the Organic Product Certification Implementation Rules (CNCA Announcement No. 21, 2019) issued on November 6, 2019. The revised rules were issued and implemented on July 6, 2022, with a transition period until December 31, 2023, and full implementation from January 1, 2024.

In order to promote the certification of organic products, the State Administration for Market Regulation (SAMR) launched a national publicity week from September 19 to 23, 2022, with the theme "Organic product certification: Help the industry to enjoy the beauty of ecology". In July 2022, the Certification Supervision Department of SAMR organised the collection of "Good Practice Cases of Organic Product Certification" and received a total of 127 cases. Thirty cases were selected and officially announced on the platform.

[1] Accreditation Administration of the People's Republic of China (CNCA); see http://www.cn-organic.org.cn

The 15th Biofach China was held in Shanghai in May 2021, with 213 companies participating from six countries and regions worldwide, a 50 percent increase over the previous year. An online real-time broadcast called "Mr Organic" attracted visitors virtually to the exhibition in an innovative way.

India

The Government of India promotes natural farming systems through the "National Mission on Natural Farming (NMNF)", with an initial allocation of 158 billion Indian rupees[1] for four years starting 2022-23. NMNF proposes to develop 15'000 clusters of 50 hectares each in villages involving more than 1.5 million farmers.

During 2022, India saw a more extensive acceptance of Participatory Guarantee Systems (PGS) in organic sector development. More than one million hectares of agricultural land are under PGS certification, with an estimated crop production of 0.8 million tons. This is in addition to the third-party certified organic sector and certified wild collection.[2] 2023 has been announced as the International Year of Millets. Support will be provided for post-harvest value addition, enhancing domestic consumption and branding millet products nationally and internationally.[3]

The Indian organic market is further expected to grow at a CAGR of about 20.5 percent in the forecast period of 2021 and 2026.[4]

Indonesia

Since 2021, Indonesia Organic Alliance, an IFOAM member, has been promoting Participatory Guarantee Systems, locally called "PAMOR". This initiative reached four provinces and 43 groups of farmers. In 2022, 13 PAMOR units with more than 574 farmers were involved, covering more than 96 hectares of organic land.

The promotion of organic agriculture has been developed through local regulations. Since 2021, there have been seven local government acts on organic agriculture, and this trend is currently being replicated in other local government units.

Iran

The domestic market for organic products in Iran is still relatively small. With increasing awareness and knowledge among consumers of organic products being healthy, chemical-free and without artificial substances, they are also recognised as socially and economically fair to the producers, especially smallholder farmers.

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[1] 158 billion Indian rupees corresponded approximately to 1.8 billion euros or 1.9 billion US dollars in 2022.
[2] National Center for Organic and Natural Farming: Participatory Organic Guarantee System for India. More information is available at https://pgsindia-ncof.gov.in.
[3] Government of India, Budget 2022-2023. Available at https://www.indiabudget.gov.in/doc/budget_speech.pdf
[4] The times of India, August 16, 2022: Organic farming: The future of India's agro-economy. Available at https://timesofindia.indiatimes.com › blogs › organic farming: future of India's agro-ecology

The European Union is one of the leading importers of Iranian organic products. Despite no changes in organic agricultural lands in recent years, there has been an increase in exports of organic products, such as sumac[1], rose flower, liquorice, ferula gummosa[2] and barberry[3].

Nowadays, there are many organic shops not only in the capital of Teheran but also throughout the 15 provinces in the country. Organic shops and dozens of online shops operate under the supervision of the Iran Organic Association (IOA), which provides support for market development and organic stakeholders. Since 2011, IOA has conducted an annual international congress and various workshops, and it promotes organic business through international and national networking.

An updated version of the "Requirement of production, processing, inspection & certification, labelling and marketing of organic food (INSO - 11000)" was published by the Institute of Standards and Industrial Research of Iran (ISIRI) in 2021, in cooperation with universities and private companies.

Several institutions, including the Environmental Sciences Research Institute of Shahid Beheshti University in Tehran, the Ferdowsi University of Mashhad and the Islamic Azad University, Karaj Branch, carry out research programs on organic agriculture production, processing and marketing.

Iraq[4]

The Ministry of Agriculture in Iraq adopted an approach of using organic alternatives to fertilisers and pesticides and established a project in each province. The project was developed in the Najaf Agriculture Directorate by treating plant waste through composting with the addition of some biological stimulants.

In 2022, more than 20 percent of Iraqi farmers grew organic products. The number of companies marketing organic products increased from 22 to 76 between 2003 and 2022.

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[1] Sumac is any of about 35 species of flowering plants in the genus Rhus and related genera in the cashew family (Anacardiaceae). Sumac grows in subtropical and temperate regions throughout the world, including East Asia, Africa, and North America. Sumac is used as a spice, as a dye, and in medicine. Source: Wikipedia at https://en.wikipedia.org/wiki/Sumac.

[2] Ferula gummosa is a perennial herb of Ferula in the family Apiaceae. It is native to Iran and Turkmenistan. Its gum resin is called galbanum. For more information see "Ferula gummosa" on Wikipedia at https://en.wikipedia.org/wiki/Ferula_gummosa

[3] Berberis, commonly known as barberry, is a large genus of deciduous and evergreen shrubs from 1–5 meters tall, found throughout temperate and subtropical regions of the world (apart from Australia). Species diversity is greatest in South America and Asia; Europe, Africa and North America have native species as well. The best-known Berberis species is the European barberry, Berberis vulgaris, which is common in Europe, North Africa, the Middle East, and central Asia, and has been widely introduced in North America. It produces large crops of edible berries, rich in vitamin C, but with a sharp acid flavour. The country in which they are used the most is Iran, For more information see "Berberis" on Wikipedia at https://en.wikipedia.org/wiki/Berberis.

[4] Reference: Chatzistathis, T., V. Kavvadias, T. Sotriopoulos and I. E. Papadakis. 2021. Organic fertilization and tree orchards. Agriculture, 11, 692.

The total organically cultivated area is 21'000 hectares, and this is expected to be increasing because of the high prices of chemical fertilizers.

Japan

There was a revision of the Japanese Agriculture Standards Law – organic algae and liquor were included in the JAS law in December 2021 and May 2022.[1,2]

In January 2022, the Ministry of Agriculture, Forestry and Fisheries (MAFF) started the "Organic Village" project.[3] The Organic Village approach to local communities is significant to promote organic farming associated with the local governments, organic farmers and organic food consumption industries such as hotels, B&Bs, school meal providers and tourism companies. The Ministry provided an 837-million-yen[4] subsidy for the fiscal year of 2022 to build the organic village model in 100 cities and towns by 2025. The project aims to stimulate the present organic farmland share of 0.3 to 25 percent by 2050.[5]

The Ministry of the Environment revised the law on promoting green procurement in February 2022. One of the priorities is using organic food ingredients in government restaurants.[6]

The Measures for the Achievement of Decarbonization and Resilience with Innovation (MeaDRI) was enforced on July 1, 2022.[7] The law establishes the basic principles for the establishment of a food system in harmony with the environment and an accreditation system for business activities to reduce environmental impact and promote the sustainable development of the agriculture, forestry, fisheries and food industries, the development of a healthy economy with a low environmental impact, etc. In line with the enforcement of the MeaDRI Law, the Ministry of Education, Culture, Sports, Science and Technology (MEXT) has requested financial support for organic school lunch programs under the national budget of 2023.[8] The Natural School Lunch Action started

[1] MAFF, "Organic algae is added to JAS", 7 December 2021, available at https://www.maff.go.jp/j/jas/jas_kikaku/attach/pdf/yuuki-236.pdf (in Japanese).
[2] MAFF, "Organic liquors are added to JAS", 25 May 2022, available at https://www.maff.go.jp/j/jas/r4_jashou_kaisei.html (in Japanese)
[3] MAFF, "Towards the creation of "Organic Village", 1 January 2022, https://www.maff.go.jp/j/seisan/kankyo/yuuki/attach/pdf/yosan_yuuki-10.pdf (in Japanese)
[4] 837 million yes corresponded to approximately 5.9 million euros or 6.3 million US dollars.
[5] MAFF, "Sustainable Food Systems Strategy, MeaDRI", 12 May 2021, https://www.maff.go.jp/e/policies/env/env_policy/meadri.html
[6] ENV, "Green Procurement Law", February 2022; available at https://www.env.go.jp/policy/hozen/green/g-law/net.html (in Japanese)
[7] MAFF, "MeaDRI Law", came into force on 1 July 2022.; https://www.maff.go.jp/j/kanbo/kankyo/seisaku/midori/houritsu.html (in Japanese)
[8] MEXT, "Key points of the budget request for the fiscal year 2023", 7 September 2022; https://www.mext.go.jp/content/20220829-mxt_kouhou02-000024712_1.pdf (in Japanese)

in 2019 in Ama City (Aichi Prefecture) and has grown to include 40 groups[1] from Hokkaido to Kyushu in providing organic school lunches.

In August 2021, the Allied PGS Meeting was held, and members from PGS initiatives attended the meeting.[2] The discussion centred on establishing the Organic Villages and exchanging ideas to spread organic farming in the local communities.

Kyrgyzstan

The first Law on Organic Agricultural Production was developed and adopted in 2017 but did not meet the requirements of international organic standards. After several discussions by the state and the public, it was amended, and a new version was developed based on the Codex Alimentarius and IFOAM Standards. It was approved on November 22, 2022, by the Parliament of the Kyrgyz Republic at the first reading. The Law encompasses the following:

- As a roadmap for developing and promoting organic agriculture until 2027, the state program "Organic Products" was developed. It provides state mechanisms to support organic production and the development of by-laws and legal documents to create a favourable environment for supporting the sector. The program is being coordinated in the ministries to adopt a government decree.
- Regulations on the certification system were developed to describe all certification steps under third-party certification and the PGS. PGS is described and accepted as an alternative system for assessing the quality of organic production for the domestic market.
- Within the Customs Union (Eurasian Economic Union) framework, technical regulations for organic production are being developed for all Union member states. The Federation of Bio-KG, as part of the working team from Kyrgyzstan, takes an active part in developing this document.

Maldives

There are promising examples of private sector businesses working in organic farming, such as the Seagull Maldives. Maafahi agriculture island has high-end farms that are part of the operations for high-end luxury resort hotels in the Maldives, such as Al Fresco Organic Farm Restaurant on Vaakaru Maldives Resort (Vaakaru Maldives, 2022).

The key to the fledgling organic farming economy is related to investment and communication. The Maldives citizens are harnessing the power of social media.

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1 Representative prefectures supplying the organic school lunches are Hokkaido (Obihoro City), Chiba (Kisarazu & Isumi Cities), Tokyo (Musashino City), Saitama (Ogawa Town), Aichi (Nagoya, Ama, Inuyama, Inazawa Cities), Hyogo (Toyooka City), Ehime (Imabari City), Miyazaki (Aya Town) and Ooita (Usuki City).
2 Atsushi Kato et al., "Organic Shizukuishi PGS Initiatives Activities in Japan" pp.106-109, Proceedings of the 4th Organic Asia Congress, November 26th – 29th, 2021. Members came from Shizukuishi Town (Iwate Prefecture), Aizu City (Fukushima Prefecture), Ichikawa City (Chiba Prefecture), Niigata City (Niigata Prefecture), Nagano City (Nagano Prefecture), Togo Town (Aichi Prefecture), Shirakawa Town (Gifu Prefecture), Syobara City (Hiroshima Prefecture).

International support, private and public investment, and policy change are critical to growing the organic farming industry in the Maldives.

Mongolia

Following the passage of the Organic Food Law in Mongolia in 2016, the Ministry of Food, Agriculture and Light Industry (MOFALI) has continued to support the National Parliament to develop regulations on "Support and Incentives for Organic Food Producers" which is expected to be discussed in Parliament in 2023.

The number of PGS and producers continues to rise slowly. As of November 2022, 19 PGS groups have been certified, and 658 products have been certified under the Organic Food Law. In addition, private sector actors have developed non-food products, such as cashmere and horse-hair sustainability standards. There are now nascent third-party certifiers for Mongolian organic certification. International support for organic agriculture development with training and PGS registration coaching has been provided through the NGO Adventists Development and Relief Agency (ADRA), by the Government of Germany and through FAO by the Swiss Development Cooperation (SDC). The United Nations Industrial Development Organization (UNIDO) and FAO support training on IFOAM Standards for third-party certifiers and legal revisions, respectively.

Pakistan

Amidst Pakistan's severe climate change scenario, there is a dire need to shift towards sustainable organic agriculture to help combat climatic threats, boost national agriculture, and bring it up to international levels.[1]

Many areas of Pakistan, including northern Punjab, Khyber Pakhtunkhwa, Eastern Balcohstain, Azad Kashmir, Sindh, and Gilgit Baltistan, are suitable for organic food farming. The Government of Pakistan is helping the local smallholder farmers by providing better quality organic seeds, biofertilisers, and bio-pesticides to encourage them to improve their crop production and profitability by adopting good, sustainable soil and production practices.[2]

The Ministry of National Food Security & Research is working with other organisations to promote organic agriculture.[3] In one of the initiatives of the Centre for Agriculture and Bioscience International (CABI), an organic agriculture project focuses on developing an organic seed production system of five crops, including wheat, cotton (in association with the Organic Cotton Association), onion, tomato, and chilli in the Barkhan and Lasbella districts of Balochistan. CABI is carrying out a research project in collaboration with the Laudes Foundation to build a policy ecosystem for the organic

[1] Pakistan Economic Survey 2021-22, Agriculture; available at https://www.finance.gov.pk/survey_2022.html
[2] Pakistan Today, 12 June 2002: Natural Mode of Life: Trend of organic food on rise in KP. Available at https://www.pakistantoday.com.pk/2022/06/12/natural-mode-of-life-trend-of-organic-food-on-rise-in-kp/
[3] Ministry of National Food Security & Research, Government of Pakistan, available at http://www.mnfsr.gov.pk/

production landscape in Balochistan, which will expand to the rest of Pakistan.[1] Moreover, efforts are being carried out to a countrywide working group that will observe the implementation of the organic agriculture policy by supplying high-quality organic seeds and essential organic inputs.[2]

The Organic Cell at the Pakistan Agricultural Research Council/National Agricultural Research Centre is working on developing organic standards and researching the production of wheat and other crops under organic conditions.[3]

Philippines

In December 2021, Republic Act 11511 (Act Amending the Organic Agriculture Act of 2010) aimed to strengthen the practice of organic agriculture in the Philippines. One of the Act's biggest highlights is the recognition of the Participatory Guarantee System (PGS), which allows various PGS groups in the country to label their products as organic. In May 2022, the Department of Agriculture, through the Bureau of Agriculture and Fisheries Standards (BAFS) and the National Organic Agriculture Program, granted accreditation of the First Participatory Guarantee System Organic Certification Body to the core group in the Municipality of Tublay, Benguet, Philippines.

Organic Trading Posts (OTPs) are places where organic products are showcased and sold in different localities and connect producers to consumers. As of 2022, there were 85 established OTPs throughout the Philippines. The National Organic Agriculture Program monitors them.[4]

In Negros Island, the Provincial Government of Negros Occidental highlighted their Executive Legislative Agenda Goals for 202 to 2025, emphasising agricultural competitiveness improvement and food security through promoting organic agriculture practices. Also, the Negros Island Organic Farmers Festival, celebrating its 15th anniversary, was held as an in-person event after two years.

In 2023, Bacolod City planned to build an almost two-hectare wholesale poultry and produce market to include in-conversion and PGS-certified farmers' products and third-party certified organic products. In addition, a model organic food garden in public high schools will be started in the city, serving its teachers and students organically grown meals. In addition, FamilyFarms Inc., a social enterprise in the province, producing organic rice "of the highest quality at a fair price to support improved livelihoods for farmers", conducted training events to increase the production volume of organic rice farmers.

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[1] Dr. Saif Ali, Project Officer, Centre for Agriculture and Bioscience International, Rawalpindi

[2] CABI News, 8 October 2021: CABI works in partnership to promote organic agriculture in Pakistan. Available at https://www.cabi.org/news-article/cabi-works-in-partnership-to-promote-organic-agriculture-in-pakistan

[3] Dr Sikander Khan Tanveer, Principal Scientific Officer/ Program Leader, Wheat National Agricultural Research Centre, Islamabad, Pakistan

[4] Republic of the Philippines, 26 May 2022: A Strengthens Organic Trading Post Utilization. Available at https://noap.da.gov.ph/2022/05/26/da-strengthens-organic-trading-post-utilization/

Saudi Arabia

During the past years, Saudi Arabia has prioritised sustainable agriculture and environment-friendly farming practices. In 2005, organic agriculture was adopted by the Ministry of Environment, Water & Agriculture to support the organic sector. The government established a functional institutional framework with the Department of Organic Production as the competent authority within the Ministry of Environment, Water and Agriculture; the Saudi Organic Farming Association as a private and independent non-profit organisation incorporating all private stakeholders related to organic agriculture under one umbrella; and the National Center of Organic Agriculture as a research institution. The Saudi Organic Regulation with a national organic logo was approved in 2014 and serves as the legal framework for certifying organic farms. Six certification bodies have been licensed to operate in the Kingdom.

A national policy of organic agriculture and an executive action plan were approved in 2016 and 2018, respectively, to support the development of the organic sector. The local organic production exceeded 105 thousand tons in 2021 compared to 45.6 thousand tons in 2018, an increase of 130.2 percent. Organic agricultural land has increased by more than 45.5 percent and reached 27.1 thousand hectares with 400 farmers in 2021. The remarkable growth of the organic farming sector is a result of the application of the Executive Action Plan of Organic Agriculture Policy, aiming to enhance the development of the organic sector by spreading awareness of organic farming and food, boosting supply chains and marketing, supporting research and organic inputs and sharing responsibilities among all stakeholders.

The number of organic food stores reached 265 in 2021, recording a 39.4 percent growth compared to 2018. From 2018 to 2020, the Saudi market value for domestic and imported organic products recorded a growth rate of 45.6 percent and reached 1.76 million Saudi riyal.[1]

In November 2022, Biofach Saudi Arabia became the eighth member of the international Biofach family. It is the first international organic hub for the Middle East and North Africa (MENA) region, organised in collaboration with the Nurnberg Messe Group. Moreover, the government endorsed an annual organic event on 11 November named "Organic Food Day" and proved its support of the organic sector in Saudi Arabia.

South Korea

2021 saw a decrease of 7 percent in the number of environmentally-friendly[2] farms amounting to a total decrease of 5.3 percent in the overall number of farms nationwide. Farms under organic production have been steadily increasing for the past five years, while farms certified for non-pesticide production have decreased. The number of livestock farms under environmentally-friendly production increased by 6.6 percent to 6'800 farms and organic livestock increased by 19.2 percent to 124 farms.

[1] 1.763 million Saudi rial corresponded to approximately 440 million euros or 470 million US dollars.
[2] Environmentally-friendly consists of both organic and non-pesticide production and certification.

2022 also saw the return of in-person organic events such as the "Organic Day (2 June)[1]" events and the 2022 IFOAM-Goesan International Organic Expo under the theme "Organics for a Healthy World" was attended by a record-breaking number of 752'355 persons. Eighteen conferences were organised by the local organic groups and attended by almost two thousand participants from 36 countries and areas. The conferences focused on analysing current organic policies, trends, and prospects of the organic sector from farm to table.

Local groups continued the movement calling for reforming the environmentally-friendly certification system due to the incidences of cancellations of non-pesticide certification despite the non-use of pesticides. The groups are advocating a "process-oriented" system and not a system based on pesticide test results.

Campaigns are also being undertaken to preserve funding for important policies in support of public consumption of environmentally-friendly food prioritised by the former government, such as support for the pregnant women's organic food box scheme, support for fruit as snacks in schools, etc. The current government cut funding for these schemes. These campaigns by the local groups aim to preserve agriculture and ecology and protect future generations' health and well-being.

Turkey

In Turkey, organic agriculture started with the European demand in the 1984-85 season for organic raisins and dried figs, traditional export products. Organic agriculture developed rapidly for dried fruit, nuts, and cotton during the next decade. As of 2021, the product range has reached 263 based on raw materials. In addition, the number of products available in the domestic and export markets steadily increases with the processed food and non-food products obtained from these raw materials.

In recent years, with the support policies and the efforts of non-governmental organisations, the interest in organic products in the domestic market has been increasing. Today, there are 19 organic markets, primarily in metropolitan cities. They are established and monitored by municipalities, non-governmental organisations and the Ministry of Agriculture and Forestry.

The main organic products for the export market are seedless raisins, dried figs, dried apricots, hazelnuts, wheat, and wheat-based products. Traditionally, the European Union member states are the main destination. However, Turkish organic goods have been exported to more than 40 countries in recent years, with increasing shares in new markets such as the USA, Gulf countries, China, Japan and other European countries. Seventy-five percent of Turkey's organic product exports are from the western Aegean Region. The Aegean Region is also the leading region in organic cotton, cotton-based products, and processed food products.

[1] "Organic" has the same phonetic sound as "June 2"

Vietnam

After three years of implementing the Decree on Organic Agriculture, the number of provinces and cities practising organic agriculture has increased significantly from 46 out of 63 provinces in 2018 to 57 in 2021. This figure is estimated to be 62 out of 63 provinces by the end of 2022, showing the extent of organic agriculture in Vietnam.

After the government promulgated the National Organic Agriculture Development Program in 2020, many provinces issued local organic development programs. Thirteen provinces have issued programs to implement the National Organic Agriculture Program, ten have issued their own organic development program, and 38 have integrated programs with other local agricultural development programs.

In 2022, 31 Vietnamese Certification Bodies (CB) were licensed to certify according to TCVN:11041 (Vietnamese Organic Standards), and some Vietnamese CBs have been licensed to certify JAS and EU standards.

The demand for organic products continues to increase for domestic and export markets, prompting a significant increase in organic manufacturers in 2022. Up to 40 companies importing organic products and 17'174 organic producers were recorded in mid-2022.[1]

IFOAM Organics Asia in 2022

IFOAM Organics Asia continued promoting organic school meals and public procurement. It organised the "1st International Conference on School Meals and Public Procurement" under the aegis of the ALGOA Center for Public Procurement (ACPP) headed by the New Taipei City Government. Co-organised by the Global Alliance of Organic Districts (GAOD), the conference under the theme "Leave No Child Behind" brought together more than 400 participants from 37 countries and areas around the world.

IFOAM Organics Asia implemented the co-organised work and programs of the 2022 IFOAM-Goesan International Organic Expo, a 17-day organic event culminating in 752'355 visitors. The event's highlight was the 50th IFOAM Anniversary Commemorative Conference and ISOFAR Scientific Conference. The "OrganicsForAll Declaration" was adopted at the end of the conferences, which brought more than a hundred participants from 36 countries and areas around the world. The International Organic Expo ended with adopting the "Organic 3.0 Local Governments Declaration" read by organic mayors and governors from South Korea, Italy, Portugal, Japan, and the Philippines.

IFOAM Organics Asia also celebrated its 10th Anniversary in conjunction with its 5th Organic Asia Congress under the theme "Transcending Borders and Generations". Organic pioneers, former and current board members and other invited VIPs from

[1] Source: Report of Agrotrade, Workshop "Review 3 years of implementing organic decree 109/ND-CP and National Organic program". Agrotrade is the Department of Agricultural Product Processing and Market Development.

Asian central and local governments joined the three-day event, which members of the Asian Organic Youth Forum coordinated.

In addition, IFOAM Organics Asia representatives participated and represented IFOAM – Organics International in the FAO 36th Regional Conference for Asia and the Pacific in March 2022 and the 8th Comisión Interamericana de Agricultura Orgánica, CIAO-IICA online event in September 2022. IFOAM Organics Asia also co-organised the virtual side-event, the FAO Science and Innovation Forum 2022, in October, together with Access Agriculture, an international non-governmental organisation based in Brussels.

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Organic Agriculture in Asia: Key Facts and Figures

JAN TRÁVNÍČEK[1], BERNHARD SCHLATTER[2], AND HELGA WILLER[3]

More than 6.5 million hectares of farmland were organic in Asia in 2021 – China had the largest area

In Asia, more than 6.5 million hectares were managed organically in 2021. Nine percent of the world's organic farmland was in Asia.

With more than 2'753'000 hectares, China had the largest farmland area under organic management, followed by India (over 2'657'000 hectares), the Philippines (over 216'000 hectares) and Thailand (almost 168'000 hectares). Almost 90 percent of Asia's organic farmland was in these four countries.

Timor-Leste is the country with the highest organic area share in Asia

Organic farmland in Asia constituted 0.4 percent of the total agricultural land of the continent and was thus below the global organic area share of 1.6 percent in 2021.

The country with the highest organic area share was Timor-Leste (8.5 percent), followed by South Korea (2.5 percent) and Sri Lanka (2.4 percent).

Asian organic farmland increased by more than 356'000 hectares

Organic land increased by more than 356'000 hectares in Asia from 2020 to 2021, representing an increase of 5.8 percent. In the decade 2012 to 2021, organic farmland grew by 102 percent, a rate similar to that of global organic farmland.

Key crops grown: cereals, oilseeds and textile crops

More than half of the organic farmland in Asia is for arable crops (3'390'547 hectares). Among the key crops are cereals (1'653'261 hectares) and oilseeds (723'168 hectares), mainly in China, and textile crops (602'700 hectares), mainly in India.

Permanent crops accounted for approximately 14 percent of total organic land in Asia in 2021. Among the key crops were coconuts (250'263 hectares), mainly in the Philippines, and tea and mate (178'160 hectares) and nuts (65'939 hectares), mainly in China.

Organic producers, processors and importers: India leads with almost 1.6 million producers.

There were more than 1'782'000 organic producers in Asia. Most of the farmers were in India, which is the country with the largest number of farmers worldwide (almost 1'599'010). Almost half of the world's organic producers were in Asia. Compared to 2020, 29'075 fewer organic producers were counted (-1.6 percent), mainly due to the

[1] Jan Trávníček, Czech Organics, Staré Město, Czech Republic, www.czechorganics.com
[2] Bernhard Schlatter, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
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decrease of producers reported from Thailand (-23'062). A total of 3'582 exporters and 15'754 processers were reported.

Retail sales: Insufficient information on the organic food market in Asia

Organic retail sales numbers for Asia are not sufficient. Only 10 out of 47 countries with organic farmland provided organic retail sales figures. Of these countries, only China, South Korea and Saudi Arabia provided an update for 2021. Total organic retail sales reported in 2021 reached more than 13.7 billion euros. This does not, however, mean that there is no domestic market for organic products in Asia. Many countries have developed local markets.

Organic exports

While data on the domestic market are not sufficient, data on organic export volumes (metric tons) to the European Union, which is the major export market for Asia, has been available since 2018. Export data to the US has been available even for longer (since 2014) but are less significant (13.1 percent of all exports to the EU and US in 2021) and do not cover all exported products.

Data show that in 2021 over 674'000 metric tons of products were exported from Asia to the EU and US, constituting 14.4 percent of all organic imports to these countries/trade blocks.

India is the largest exporter

The largest Asian exporter to the US was India (more than 249'000 metric tons of products, mainly oil cakes, rice, and sugar, followed by China (almost 153'000 MT, mainly oil cakes, spices, and nuts) and Pakistan (45'625 MT, mainly rice).

Oilcake is the most important export product

Comprising more than 201'332 metric tons and almost 30 percent of Asian organic exports, oilcake and oils were the most important product group (mostly oilcake: 179'611 metric tons), followed by rice (97'514 MT) and sugar (55'131 MT).

For more information about organic in Asia see figures and data tables on the following pages.

Organic Agriculture in Asia: Graphs

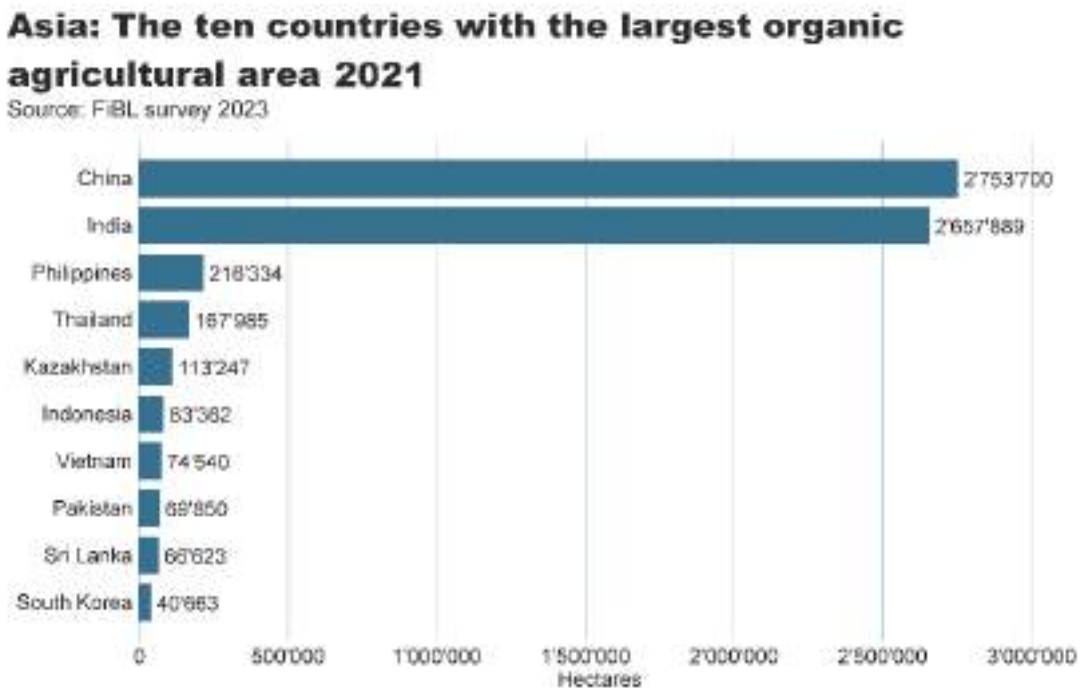


Figure 65: Asia: The ten countries with the largest organic agricultural area 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

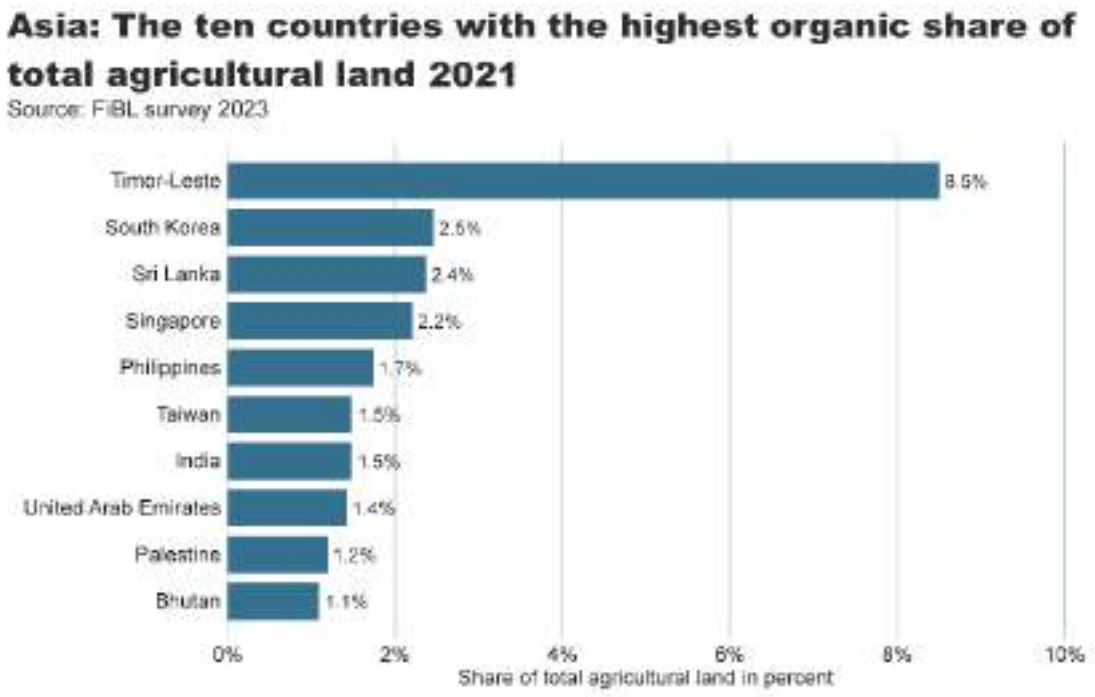


Figure 66: Asia: The countries with the highest organic share of total farmland 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

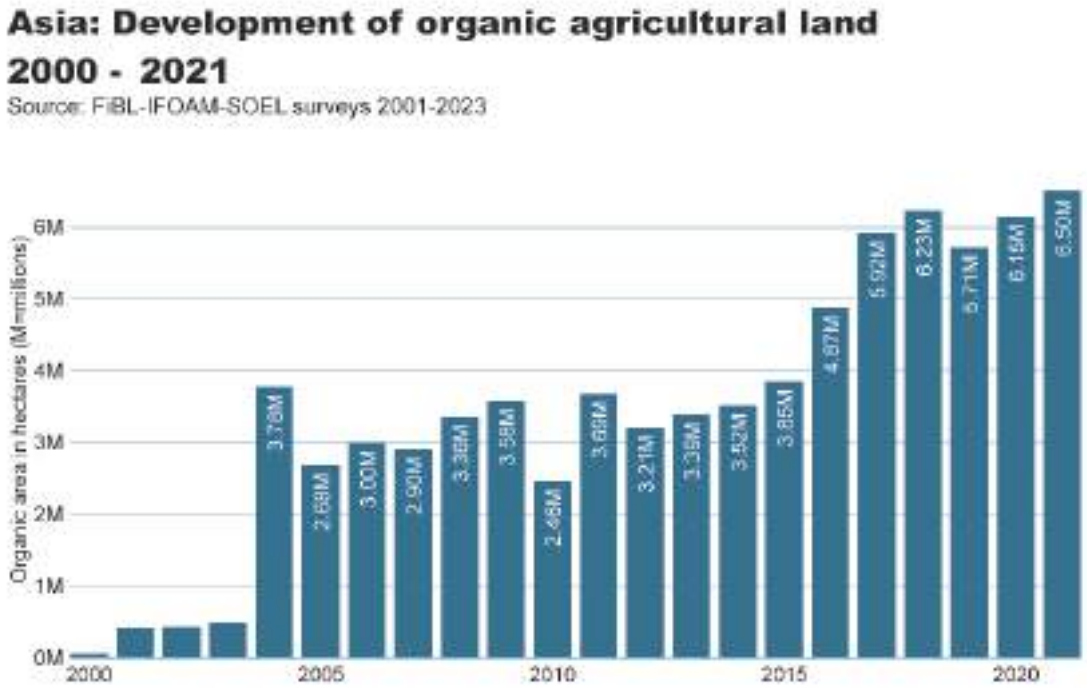


Figure 67: Asia: Development of organic agricultural land 2000-2021

Source: FiBL-IFOAM-SOEL-surveys 2001-2023

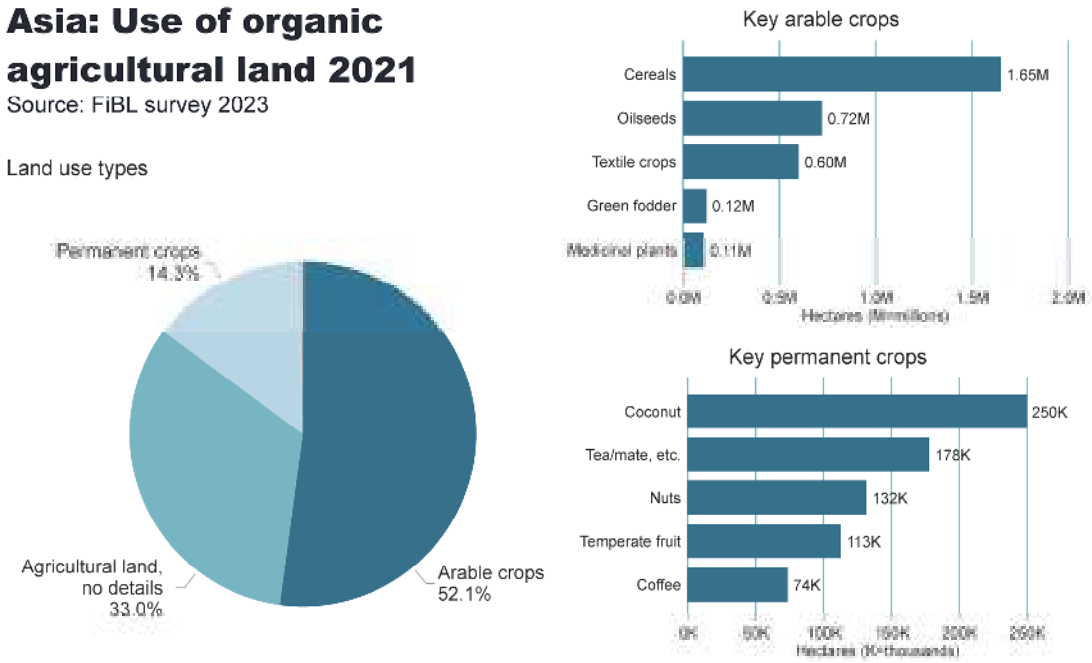


Figure 68: Asia: Use of organic agricultural land 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments.

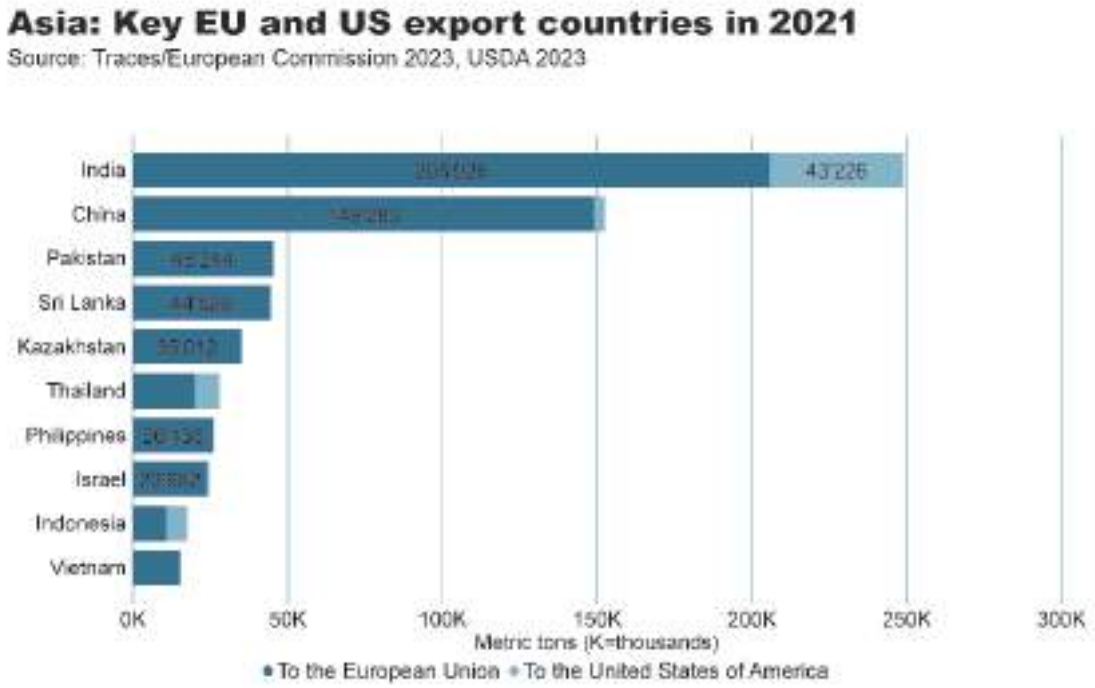


Figure 69: Asia: Key countries exporting to the EU and US (export volume in MT)

Source: GATS/USDA 2022 and TRACES/European Commission 2022

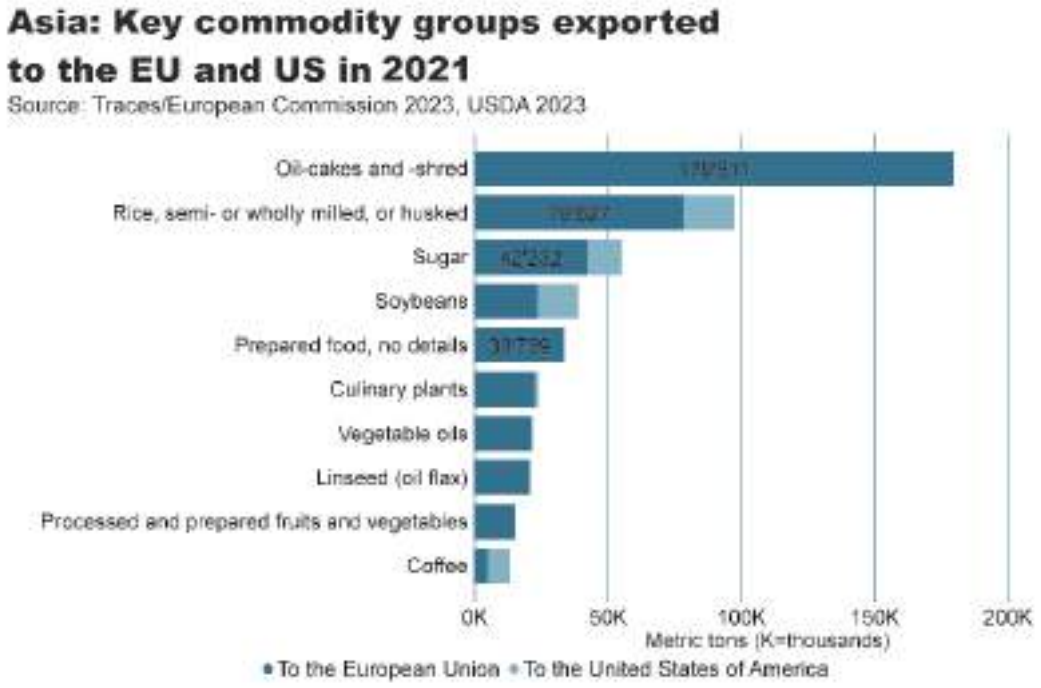


Figure 70: Asia: Key commodity groups exported to the EU and US (export volume in MT)

Source: GATS/USDA and TRACES/European Commission 2022

Organic Agriculture in Asia: Tables

Table 59: Asia: Organic agricultural land, organic share of total agricultural land and number of organic producers 2021

Country/Territory	Area [ha]	Share of total agri. land [%]	Producers [no.]
Afghanistan	98	0.0%	
Armenia	583	0.0%	27
Azerbaijan	38'080	0.8%	446
Bangladesh	504	0.0%	
Bhutan	5'608	1.1%	1'998
Cambodia	21'112	0.4%	4'135
China	2'753'700	0.5%	14'847
Georgia	4'278	0.2%	729
India	2'657'889	1.5%	1'599'010
Indonesia	83'362	0.1%	17'836
Iran (Islamic Republic of)	7'053	0.0%	346
Iraq	63	0.0%	
Israel	5'778	0.9%	345
Japan	11'992	0.3%	3'678
Jordan	1'446	0.1%	23
Kazakhstan	113'247	0.1%	281
Kuwait	32	0.0%	1
Kyrgyzstan	30'259	0.3%	1'144
Lao People's	7'993	0.3%	1'519
Lebanon	1'671	0.3%	124
Malaysia	1'276	0.0%	30
Mongolia	241	0.0%	314
Myanmar	10'143	0.1%	68
Nepal	2'448	0.1%	1'048
Oman	7	0.0%	1
Pakistan	69'850	0.2%	934
Palestine	5'517	1.2%	1'632
Philippines	216'334	1.7%	13'069
Republic of Korea	40'663	2.5%	25'362
Saudi Arabia	27'110	0.0%	400
Singapore	15	2.2%	
Sri Lanka	66'623	2.4%	1'940
Taiwan	11'765	1.5%	4'436
Tajikistan	22'292	0.5%	166
Thailand	167'985	0.8%	73'611
Timor-Leste	32'311	8.5%	3
United Arab Emirates	5'419	1.4%	152
Uzbekistan	4'925	0.0%	26
Viet Nam	74'540	0.6%	12'453
Total	**6'504'211**	**0.4%**	**1'782'134**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.
**Total number includes data for countries with less than three operators.*

Table 60: Asia: Land use in organic agriculture 2021

Land use	Crop group	Area [ha]
Agricultural land and crops, no details		42'473
Arable land crops	Cereals	1'653'261
	Dry pulses	30'230
	Fresh vegetables and melons	59'066

Land use	Crop group	Area [ha]
	Medicinal and aromatic plants	108'101
	Mushrooms and truffles	13'346
	Oilseeds	723'168
	Plants harvested green	123'259
	Root crops	18'616
	Strawberries	34
	Sugarcane	6'289
	Textile crops	602'700
	Arable crops, other	21'387
	Fallow land, crop rotation	31'089
Arable land crops total		**3'390'547**
Other agricultural land		32'848
Permanent crops	Berries	305
	Citrus fruit	13'393
	Cocoa	380
	Coconut	250'263
	Coffee	73'799
	Fruit	13'254
	Fruit of temperate climate zones	112'935
	Fruit, tropical and subtropical	41'411
	Fruit/nuts/berries	3'018
	Grapes	14'861
	Medicinal and aromatic plants, permanent	27'400
	Nuts	131'955
	Olives	9'394
	Tea/mate, etc.	178'160
	Permanent crops, other	57'671
Permanent crops total		**928'199**
Permanent grassland		**8'468**
Total		**6'504'210**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 61: Asia: Land use in organic agriculture 2021 by country

Country/Territory	Agricultural land and crops, no details [ha]	Arable land crops [ha]	Permanent crops [ha]	Permanent grassland [ha]	Other agricultural land [ha]
Afghanistan			98		
Armenia	583				
Azerbaijan	37'454		626		
Bangladesh			504		
Bhutan	5'608				
Cambodia	498	20'447	168		
China		2'339'700	414'000		
Georgia	2'573		1'705		
India	2'028'676	629'213			
Indonesia	5'517	290	77'554		
Iran (Islamic Republic of)	44	996	6'004		7
Iraq		53	10		
Israel		3'235	2'221		322
Japan		8'204	1'848	1'756	184
Jordan	854	43	549		
Kazakhstan		108'072	35	4'809	331
Kuwait		11	11		10
Kyrgyzstan		29'836	423		

Country/Territory	Agricultural land and crops, no details [ha]	Arable land crops [ha]	Permanent crops [ha]	Permanent grassland [ha]	Other agricultural land [ha]
Lao People's Democratic Republic	18	2'931	5'044		
Lebanon		247	1'124	300	
Malaysia	1'115	161			
Mongolia		242	0		
Myanmar	695	676	8'772		
Nepal	651	400	1'379		17
Oman	4	2			
Pakistan	13'540	53'545	2'765		
Palestine		508	5'009		
Philippines	303	1'036	214'981		14
Republic of Korea	37'933	2'301	429		
Saudi Arabia		7'403	19'707		
Singapore		15			
Sri Lanka	347	1'824	64'451		
Taiwan	2'386	7'136	2'244		
Tajikistan		22'287	4		
Thailand		138'090	5'194	1'142	23'559
Timor-Leste			32'311		
United Arab Emirates	5'347	70	1		
Uzbekistan		4'686	239		
Viet Nam		6'887	58'788	460	8'405
Total	**2'144'148**	**3'390'547**	**928'199**	**8'468**	**32'848**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 62: Asia: All organic areas 2021

Country/Territory	Agriculture [ha]	Aquaculture [ha]	Wild collection [ha]	Other non agri. land [ha]	Total [ha]
Afghanistan	98				98
Armenia	583		3'852		4'435
Azerbaijan	38'080	573	2'126		40'779
Bangladesh	504	5'781			6'285
Bhutan	5'608		2'223		7'831
Cambodia	21'112		8		21'120
China	2'753'700		2'004'000		4'757'700
Georgia	4'278				4'278
India	2'657'889		1'681'296		4'339'185
Indonesia	83'362	795	231		84'387
Iran (Islamic Republic of)	7'051		4	1	7'056
Iraq	63				63
Israel	5'778		3		5'781
Japan	11'992				11'992
Jordan	1'446				1'446
Kazakhstan	113'247				113'247
Kuwait	32				32
Kyrgyzstan	30'259				30'259
Lao	7'993				7'993
Lebanon	1'671		258		1'929
Malaysia	1'276				1'276
Mongolia	242				242
Myanmar	10'143	20			10'163
Nepal	2'448		24'394		26'842

Country/Territory	Agriculture [ha]	Aquaculture [ha]	Wild collection [ha]	Other non agri. land [ha]	Total [ha]
Oman	7		2'200		2'207
Pakistan	69'850				69'850
Palestine	5'517				5'517
Philippines	216'334		0		216'334
Republic of Korea	40'663				40'663
Saudi Arabia	27'110				27'110
Singapore	15				15
Sri Lanka	66'623				66'623
Taiwan	11'765				11'765
Tajikistan	22'292				22'292
Thailand	167'985	458	90'742		259'186
Timor-Leste	32'311				32'311
United Arab Emirates	5'419		2		5'421
Uzbekistan	4'925				4'925
Viet Nam	74'540	40'623	3'943		119'105
Total	**6'504'210**	**48'250**	**3'815'281**	**1**	**10'367'742**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 63: Asia: Use of wild collection areas 2021

Land use	Area [ha]
Berries, wild collection	3
Medicinal and aromatic plants, wild collection	61
Nuts, wild collection	258
Oil plants, wild collection	2'200
Rose hips, wild collection	4
Berries, wild collection	3
Wild collection, no details	3'812'756
Total	**3'815'281**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments For detailed data sources, see annex, page 338.

Table 64: Asia: Organic retail sales in 2021

Country/Territory	Retail sales [Million €]	Per capita [€/person]
Azerbaijan	2.6	0.3
Bhutan	0.03	0.04
China	11'319.4	7.8
India	185.9	0.2
Japan	1'418.7	11.2
Mongolia	0.6	0.2
Republic of Korea	486.0	9.5
Saudi Arabia	306.2	9.1
Singapore	15.8	2.7
Thailand	11.9	0.2
Total	**13'747.2**	

Source: FiBL survey 2023, based on information from the private sector and governments. Please note that not all countries provided updated data. For detailed data sources, see annex, page 338.

Table 65: Asia: Organic exports to the EU and US by country

Country/ Territory	Exports to EU and USA [MT]
Afghanistan	0.3
Armenia	132
Azerbaijan	1'228
Bangladesh	235
Cambodia	7'880
China	152'529
Georgia	730
Hong Kong	91
India	249'153
Indonesia	17'627
Iran (Islamic Republic of)	1'641
Israel	24'645
Japan	5'140
Jordan	147
Kazakhstan	35'110
Kyrgyzstan	645
Lao	11'692
Lebanon	100
Malaysia	42
Maldives	455
Myanmar	95
Nepal	240
Pakistan	45'625
Palestine	861
Philippines	26'136
Republic of Korea	331
Saudi Arabia	277
Singapore	877
Sri Lanka	44'723
Syrian Arab Republic	6
Taiwan	118
Thailand	28'058
Timor-Leste	724
United Arab Emirates	319
Uzbekistan	1'257
Viet Nam	15'832
Yemen	8
Total	**674'712**

Source: GATS/USDA and TRACES/European Commission 2022

Table 66: Asia: Organic exports to the EU and US by product group

Product group	Exports to EU/and USA [MT]
Oilcakes/ oils and fats	201'332
Grain mill products	111'428
Oilseeds	70'784
Sugar	55'131
Prepared food, no details	33'739
Fruit, berries and nuts, prepared and preserved	25'239
Medicinal and aromatic plants	24'073
Processed and prepared fruits and vegetables	21'506
Root crops	15'693
Coffee	13'225
Dry pulses	13'143
Nuts	11'265
Coconut	8'302
Tea/mate, etc.	6'831
Bee products	6'604
Seeds and seedlings	5'593
Non-food products	5'376
Fresh vegetables and melons	5'153
Fruit, (sub)tropical	4'962
Cereals	4'481
Hot beverages (Coffee, tea and cacao etc.)	4'010
Medicinal and aromatic plants, permanent	3'333
Aquaculture products	2'627
Vegetables, prepared and preserved	2'541
Spices and aromatics	2'455
Textile crops	2'141
Noodles, couscous, etc.	1'909
Food and non-food products	1'641
Protein concentrates	1'621
Feedstuffs	1'577
Beverages	1'249
Other food products and product groups	1'003
Yeast and other single cell micro-organisms	888
Grapes	825
Wild collection, other	821
Berries	595
Grand Total	**674'712**

Source: GATS/USDA and TRACES/European Commission 2022, Total includes smaller volumes not shown in table.

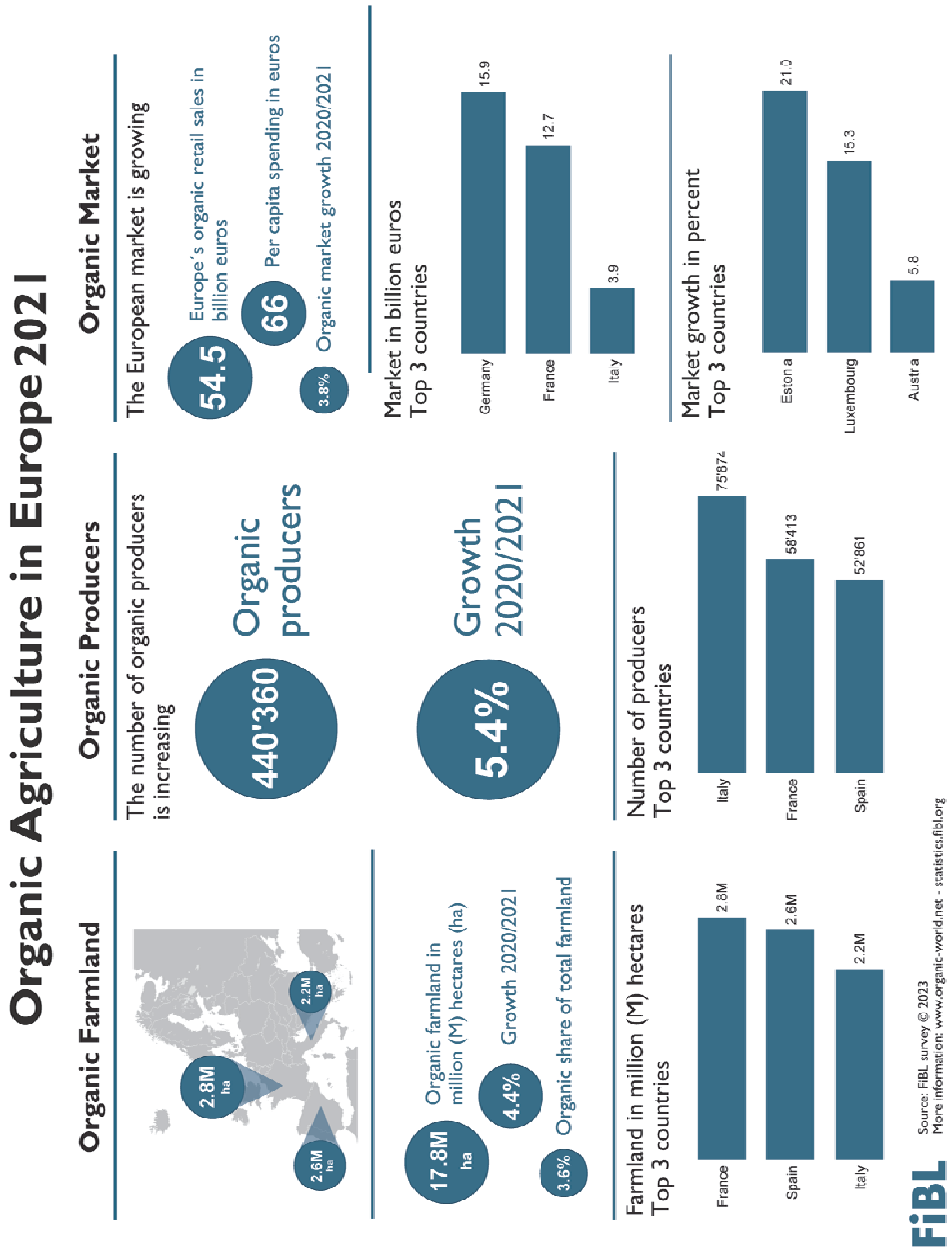
Europe



Map 4: Organic agricultural land in the countries of Europe 2021

Source: FiBL survey 2023 based on information from the private sector, certifiers, governments, and the Mediterranean Organic Agricultural Network (MOAN) for the Mediterranean countries
For detailed data sources, see annex, page 338

Infographic Organic Agriculture in Europe



Infographic 6: Organic Agriculture in Europe 2021

Source FiBL survey 2023

Organic in Europe: Recent Developments

Emanuele Busacca[1], Maria Gernert[2], Bram Moeskops[3], Amelie Steu[4] and Helga Willer[5]

The consolidated data for 2021 show continued retail sales growth in most countries; however, other than in 2021, it was single-digit.

Retail sales grew to 46.7 billion euros in the European Union (EU) and to 54.5 billion in Europe (increasing by 3.6 and 3.8 percent, respectively), whereas organic farmland grew faster (+5.2 percent), reaching 17.8 million hectares in Europe and 15.6 million in the EU (see page 235). For EU organic agriculture to reach the 25 percent goal by 2030, as set out by the European Commission, stronger annual growth will be needed than in 2021.

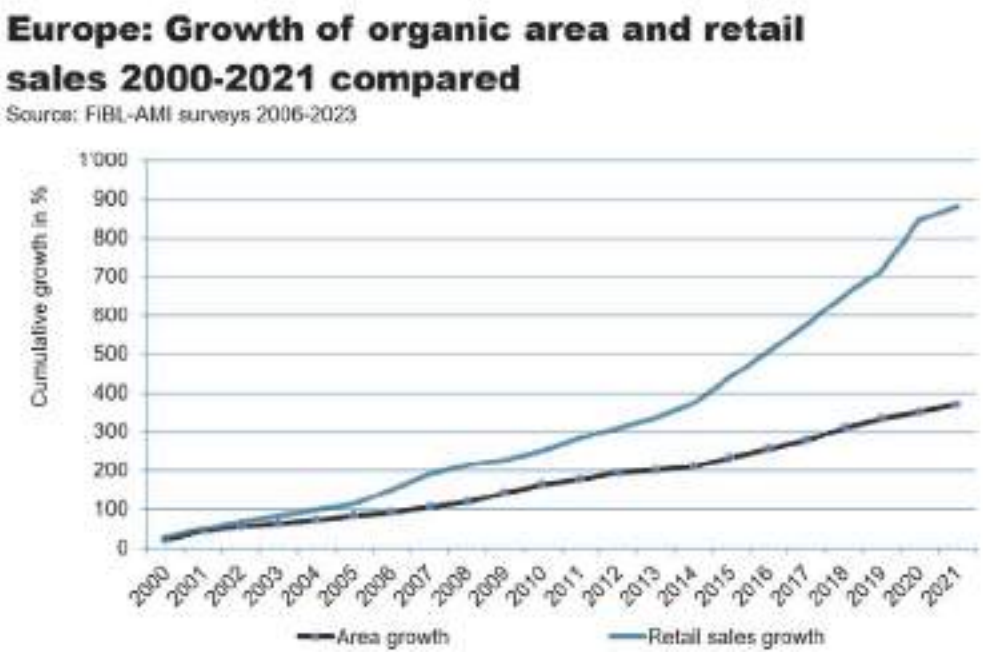


Figure 71: European Union: Growth of organic farmland and retail sales 2000–2021 compared

Source: FiBL-AMI surveys2006-2023

[1] Emanuele Busacca, IFOAM Organics Europe, Brussels, Belgium, www.organicseurope.bio
[2] Maria Gernert, TP Organics Coordinator, IFOAM Organics Europe, Brussels, Belgium, www.organicseurope.bio
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[5] Dr. Helga Willer, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org

The year 2022, with its multiple crises, was another special year for the organic sector. Many countries for which data were available at the time of writing reported a decrease in retail sales (consolidated data for Europe and the EU will be available only in early 2023). Should this trend continue, it is bound to impact organic farmland development

It is expected that 2023 will be another challenging year for the organic industry and the EU. To reach the EU Farm to Fork target of 25 per cent organic farmland in Europe by 2030, appropriate and timely support measures are needed, including a suitable regulatory framework, adequate support under the common agricultural policy (CAP), action plans, and support for research and knowledge building.

New EU regulation enters into application

In June 2018, the new EU regulation 2018/848[1] on the production and labelling of organic products was published. The new EU organic regulation was initially set to apply from 1 January 2021. However, for many reasons, including the COVID-19 pandemic, its application was postponed by one year to 1 January 2022[2]. The text that was adopted in 2018 represents the "Basic Act". The development of secondary legislation started in June 2018 and is still ongoing. This means that many text details are being developed and adopted in the form of delegated or implementing regulations. At the moment of writing, the whole set of regulations is composed of the basic regulation (EU) 2018/848 integrated by 17 delegated regulations and seven implementing regulations, and more will follow (see also chapter on regulations in this volume on page 148.).

Main changes on the production side

The scope has been enlarged and includes products closely linked to agriculture, such as beeswax, sea salt, wool, etc.

- The concept of soil-bound cultivation is strengthened with few exceptions.
- Concerning plant reproductive material (e.g. seed), the use of heterogeneous material and varieties adapted to organic farming is encouraged.
- Rules for poultry have been integrated with additional requirements, such as on pop-holes and limits to the multi-level systems. Rules for parent poultry and pullets, as well as for rabbits and deer, have been added.
- Where changes require structural interventions, transitional rules are provided.
- In aquaculture, the possibility of using non-organic juveniles is very limited.

[1] Regulation (EU) 2018/848 of the European Parliament and of the Council of 30 May 2018 on organic production and labelling of organic products and repealing Council Regulation (EC) No 834/2007; http://data.europa.eu/eli/reg/2018/848/oj

[2] Regulation (EU) 2020/1693 of the European Parliament and of the Council of 11 November 2020 amending Regulation (EU) 2018/848 on organic production and labelling of organic products as regards its date of application and certain other dates referred to in that Regulation (Text with EEA relevance); http://data.europa.eu/eli/reg/2020/1693/oj

Main changes on the food processing side

- The use of natural flavourings is restricted to a few categories, and rules for organic flavourings are established.
- The use of ion exchange and adsorption resin techniques is only allowed for baby food and wine products. Engineered nanomaterials are also banned.
- The flexibility regarding the origin of the ingredients for the indication of origin passes from two to five per cent.
- After a transitional period, there will be a list of cleaning and disinfection products allowed to be used in food processing and storage.

Main changes in control and certification

- Low-risk operators will be exempt from the mandatory annual physical inspection visit, which can be performed every 24 months. Such exemption applies only to operators in the EU.
- In any case, verification of compliance is required every 12 months.
- As for the certificate, there are mandatory models to be considered for both EU and non-EU operators.
- New approaches to dealing with suspected non-compliances and residues are established for operators and control actors.
- New group certification rules are established and detailed, with some significant changes for operators in the Global South.
- The group certification system may also be applied to small farmers in the EU and worldwide. According to the previous regulation, group certification was only possible for countries in the Global South.

Main changes in international trade and imports

Most of the current equivalency agreements with third countries have to be renegotiated under trade agreements within five years. Trade agreements with the United Kingdom, Chile and Switzerland are already in place. Therefore, there is no need to renegotiate. Negotiation talks are being opened with the third countries that already have an organic equivalency agreement with the EU (Argentina, Australia, Canada, Costa Rica, India, Israel, Japan, New Zealand, South Korea, Tunisia and the United States) and, in addition, with Mexico and Colombia. The control bodies recognised for equivalency need to be recognised for compliance within three years. In practice, the new EU organic regulation requirements will apply to third countries with a one- to one-and-a-half-year delay compared to the EU. Also, new rules applying at the EU borders for imported products apply.

New CAP regulations enter into force as of 1 January 2023

In June 2018, the European Commission launched its proposal for the Common Agricultural Policy (CAP) post-2020. The new CAP regulations were adopted by the European Parliament in plenary only on 23 November 2021, followed by the approval of the delegated and implemented acts. Most Member States submitted their draft national CAP Strategic Plans (SPs) by 31 December 2021, to which the European Commission replied with the so-called Observation Letters. The approval process for

these CAP SPs ended in early December 2022. The new CAP 2023-2027 Regulations and SPs entered into force from 1 January 2023 to 31 December 2027. The new CAP gives more flexibility to Member States in implementing the policy objectives.

The new CAP

Organic farming can make a decisive contribution towards a sustainable food and farming sector while satisfying citizens' preferences. However, large-scale conversion to organic farming is only possible if the CAP's ambition is raised, allowing more farmers to make the necessary additional efforts and investments. With the right incentives in both pillars[1], many more farmers could contribute even more to the environment, climate, and rural communities beyond 2020.

Nonetheless, the CAP's new green architecture appears too weak to address the environmental issues societies face. Indeed, it consists of so-called 'eco-schemes', which account for 25 per cent of the first pillar's budget. These eco-schemes are mandatory for the Member States but voluntary for farmers and, therefore, less binding than the former greening measures. Eco-schemes can offer a good opportunity to compensate farmers whose farming practices benefit biodiversity and the environment. However, the definition of the eco-schemes has been left in the hands of Member States and, in several countries, are not ambitious enough to favour these kinds of farming practises, including organic farming. The rest of the CAP's new green architecture consists of nine good agricultural and environmental conditions (GAECs), and 35 per cent of the second pillar's budget is dedicated to agri-environmental and climate measures (AECMs). The organic movement defended ringfencing of at least 70 per cent of the entire CAP budget across both pillars to ensure a level playing field and to avoid a race to the bottom for the climate and environment.

Besides, the new CAP includes improvements in social issues. Indeed, the organic movement welcomes the new social conditionality (mandatory as of 2025) that ensures enhanced farmers' and farm workers' rights.[2]

European Green Deal and the CAP

Finally, with the European Green Deal (European Commission 2019c) and the publication of the EU Farm to Fork (European Commission 2020a) and Biodiversity Strategies (European Commission 2020b) in May 2020, the European Commission has put forward clear objectives for transitioning to sustainable food systems by 2030. But since the CAP plays a critical role in providing the means to reach these objectives, it is

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[1] The Common Agricultural Policy of the European Union consists of two pillars:
› First pillar of the CAP: I — Common organisation of the markets (CMO) in agricultural products
› Second pillar of the CAP: rural development policy.
More information is available at https://www.europarl.europa.eu/factsheets/en/section/196/the-common-agricultural-policy-cap-

[2] The new social conditionality is based on current four EU legislative frameworks (Directive 2019/1152 on Transparent and Predictable Working Conditions, Directive 2009/104/EC on Minimum Safety and Health Requirements for use of work equipment by workers, Directive 89/391/EEC on Improvement of Safety and health of workers, Regulation 492/2011 on Freedom of movement for workers within the EU).

essential that its implementation at the national level through the National Strategic Plans explicitly and fully contributes to the Green Deal's implementation and related strategies, which include the Farm to Fork strategy, the Biodiversity strategy and the target to reach 25 per cent of organic land in Europe by 2030 (see subsequent chapter). During the CAP negotiations, Member States actively opposed a clear legal link between the CAP and the Green Deal. In the end, the Commission Implementing Regulation (EU) 2021/2289[1] specifies that Member States "shall provide an explanation of the national contribution to achieving the Union's targets for 2030" set out in the Farm to Fork Strategy and the Biodiversity Strategy. with a view of allowing the European Commission to assess the consistency and contribution of the proposed CAP Strategic Plan as well as the Union's environmental and climate legislation and commitments.

State of play of CAP National Strategic Plans

A briefing by IFOAM Organics Europe (2022) on the state of play of CAP National Strategic Plans showed that the level of ambition to develop and support organic farming is not high enough in many Member States and that unless major changes in the measures and budget occurred during the possible annual revision of the CAP SPs, the latter would not allow reaching the overall target of 25 per cent organic land by 2030 in Europe. A detailed analysis of the CAP SPs 2023–2027 and how they support organic agriculture will be published in spring 2023 as part of OrganicTargets4EU's project "Transformation scenarios for boosting organic farming and organic aquaculture towards the Farm-to-Fork targets,"[2] which IFOAM Organics Europe is leading.

Research

Organic farming research is funded under European and national research programmes and national organic action plans. Since the mid-1990s, an increasing number of organic research projects focussing on organic food and farming have been funded by the EU framework programmes for research and innovation.

Transnational collaboration

In autumn 2021, five new projects started with funding from the CORE Organic Cofund, which joins forces with the EU Member States to fund transnational research projects. The projects were selected in the third CORE Organic call for research proposal: "Organic farming systems for improved mixed plant and animal

[1] The Commission Implementing Regulation (EU) 2021/2289 of 21 December 2021 laying down rules for the application of Regulation (EU) 2021/2115 of the European Parliament and of the Council on the presentation of the content of the CAP Strategic Plans and on the electronic system for the secure exchange of information, C/2021/9601, is available at https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX:32021R2289

[2] The project website is available here: https://www.organictargets.eu/

production".[1] The funding network, renamed CORE Organic Pleiades Network[2] in 2022, consists of 33 partners from 24 countries/regions

Collaboration with the European Technology Platform TP Organics[3] and other relevant sector players has helped to ensure that the voice of transnational organisations representing farmers, industry and civil society has been taken into account.

Access to research results via Organic Eprints and Organic Farm Knowledge

The open-access repository Organic Eprints[4], a shared knowledge reservoir for disseminating research outcomes, has existed since 2002. The outcomes of CORE Organic and many other projects are archived on Organic Eprints, which has almost 30'000 entries. Organic Eprints is also the underlying database of the Organic Farm Knowledge platform (www.organic-farmknowledge.org), which provides material for organic practitioners.[5] Many new tools were added in 2022, and new languages were implemented.

Science Day and Organic Innovation Days 2022

TP Organics' Science Day, focussing on "Digital technology for local and small-scale processing" at the BIOFACH VIVANESS 2022 Summer Edition on 29 July, brought together researchers, policymakers as well as interested food producing, processing and retail companies, certifiers and auditors to show how innovative the organic sector is, including when it comes to digital technologies. A review of this event is available on the TP Organics website[6].

On 11 and 12 October, the Organic Innovation Days 2022, TP Organics' annual public event and the only EU event on research and innovation for organic agriculture, took place in Belgium. The event centred around "organic living labs and lighthouse farms". A full review of this event is available on the TP Organics website.[7]

Horizon Europe

Horizon Europe[8] is the EU's current main funding programme for research and

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[1] The call text is available here: https://projects.au.dk/coreorganiccofund/core-organic-2021-call/

[2] Information about the Pleiades project can be found at https://projects.au.dk/coreorganicpleiades/about

[3] TP Organics website: https://tporganics.eu

[4] Organic Eprints: www.orgprints.org

[5] In December 2018, the Horizon 2020-funded project OK-Net Ecofeed launched the extended knowledge platform Organic Farm Knowledge www.organic-farmknowledge.net, initially set up in the framework of another EU-funded project, OK-Net Arable. The platform aims to promote information exchange and share practical solutions among farmers across Europe. Organic Farm Knowledge is constantly working to evolve, keeping the tools and materials up to date, increasing its reach and making its content available in the national languages and through different channels. In 2022, the platform was translated into several new languages, such as Greek and Czech. Around a hundred new entries were added, as well as videos and e–learning courses. In 2022 Organic Farm Knowledge closely collaborated with Horizon Europe projects such as Biofruitnet and OrganicTargets4EU, and all of the projects' research findings are uploaded to the website.

[6] Review of Science Day 2022 on the TP Organics Website https://tporganics.eu/science-day-2022-review/

[7] Review of the 2022 organic innovation days: https://tporganics.eu/organic-innovation-days/

[8] Horizon Europe website: https://ec.europa.eu/info/research-and-innovation/funding/funding-opportunities/funding-programmes-and-open-calls/horizon-europe_en

innovation, with a budget of 95.5 billion euros for 2021 – 2027. Cluster 6 of Horizon Europe, "Food, Bioeconomy, Natural Resources, Agriculture and Environment",[1] with a total budget of 8.952 billion euros, aims at reducing environmental degradation, halting and reversing the decline of biodiversity on land, inland waters and sea; and better managing natural resources through transformative changes to the economy and society in urban and rural areas.

Three organic-specific projects are funded under the first Work Programme (2021–2022).[2][3] Starting with the work programme 2023-2024, Horizon Europe, which includes seven organic-specific calls[4], based on the European action plan for organic food and farming[5] which foresees an allocation of at least 30 per cent of the budget for research and innovation actions in the fields of agriculture, forestry and rural areas to topics specific to or relevant for the organic sector.

New Horizon Europe instruments are the EU Missions. The mission "A Soil Deal for Europe" aims to establish 100 living labs and lighthouses to lead the transition towards healthy soils by 2030. TP Organics (2022a) has published a position paper outlining the soil-related organic research needs as well as a new study on organic living labs and lighthouse farms in Europe (TP Organics 2022b), demonstrating how innovative the organic sector is in improving organic practices and inspiring the transformation of the wider agri-food system.

TP Organics moreover contributed to drafting the proposals for the new European Research and Innovation (R&I) Partnership on Agroecology living labs and research infrastructures[6] and the European Partnership for Sustainable Food Systems.[7] Both are

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[1] Cluster 6 of Horizon Europe, "Food, Bioeconomy, Natural Resources, Agriculture and Environment": https://ec.europa.eu/info/research-and-innovation/funding/funding-opportunities/funding-programmes-and-open-calls/horizon-europe/cluster-6-food-bioeconomy-natural-resources-agriculture-and-environment_en

[2] Horizon Europe Work Programme 2021-2022 https://ec.europa.eu/info/funding-tenders/opportunities/docs/2021-2027/horizon/wp-call/2021-2022/wp-9-food-bioeconomy-natural-resources-agriculture-and-environment_horizon-2021-2022_en.pdf

[3] The following projects are funded under the first work programme: InnOBreed – Innovative Organic Fruit Breeding and uses, LIVESEEDING, follow-up projects of the Horizon 2020 project LIVESEED and OrganicTargets4EU.
Furthermore, two projects are funded under the call "Innovative solutions to prevent adulteration of food bearing quality labels: focus on organic food and geographical indications"
In addition, several other projects, such as Climate Farm Demo, are relevant for the organic sector.

[4] The organic-specific calls are: Selective breeding programme for organic aquaculture - Improving yields in organic cropping systems - Increasing the availability and use of non-contentious inputs in organic farming - Sustainable organic food innovation labs - Pilot network of climate-positive organic farms - Developing an EU advisory network on organic agriculture - Organic farming thematic networks to compile and share knowledge ready for practice.

[5] Organic Action Plan for the European Union: https://agriculture.ec.europa.eu/farming/organic-farming/organic-action-plan_en

[6] European research and innovation (R&I) partnership on agroecology living labs and research infrastructures: https://research-and-innovation.ec.europa.eu/research-area/agriculture-forestry-and-rural-areas/ecological-approaches-and-organic-farming/partnership-agroecology_en

[7] European Partnership for Sustainable Food Systems: https://scar-europe.org/index.php/food-main-actions/food-systems-partnership

expected to start in late 2023/early 2024 and will be co-funded by the European Commission and the Member States. The Strategic Research and Innovation Agendas for these partnerships, to the development of which TP Organics contributed, are currently being finalised.

European Organic Congress: On the road to achieving the EU Green Deal

On June 16-17, 2022, the European Organic Congress, organised by IFOAM Organics Europe and INTERBIO Nouvelle Aquitaine, took place in Bordeaux, France, under the theme "A more organic future: On the road to achieving the EU Green Deal". Among the Congress speakers were high-level representatives of policy-making bodies, researchers, experts, farmers, entrepreneurs, processors, and retailers from all over Europe to share their diverse expertise and practical insights about the recent updates of the sector.

The Congress showcased topics such as "How EU policies can enable the ambitious and achievable targets" and "Realising the Farm to Fork & Biodiversity strategies' targets".

Organic movement expressed its solidarity with Ukrainian farmers

Ahead of the start of the European Organic Congress 2022, the Ukrainian organic movement expressed solidarity with Ukrainian farmers[1] and noted that the sector should already be prepared for cooperation during the post-war period to maintain and develop organic production in the country.

Representatives of the Ukrainian organic movement stated that Ukraine's recovery should not be a return to the pre-war status but a full-fledged redevelopment and integration into the European community based on sustainable development principles and taking into account the European Green Deal (see also the article on organic agriculture in Ukraine on page 265).

First Organic Organics Europe Youth Event a big success

The first Organics Europe Youth Event as a platform for the European Organic Youth meet was held from 31 August-1 September at the Research Institute of Organic Agriculture FiBL in Frick, Switzerland. Youth from diverse backgrounds – from farmers, retailers and processors to activists and politicians – were encouraged to discuss and learn about the potential and challenges of organic production and its role as a sustainable food system. The event fostered cross-fertilisation between different disciplines and generated innovative ideas for the future of organic production. Participants had the chance to grow their professional networks. The next edition will be announced in the IFOAM Organics Europe newsletter (subscription: www.organicseurope.bio/newsletter).

[1] The full press release from IFOAM Organics Europe "European organic movement stands in solidarity with Ukrainian organic farmers at European Organic Congress" can be found at https://www.organicseurope.bio/news/european-organic-movement-stands-in-solidarity-with-ukrainian-organic-farmers-at-european-organic-congress/

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Europe and the European Union: Key indicators 2021

Indicator	Europe	European Union[1]	Top 3 countries in Europe
Organic farmland	17.8 million hectares (ha)	15.6 million ha	France (2.8 million ha); Spain (2.6 million ha); Italy (2.2 million ha)
Organic share of total farmland	3.6 %	9.6 %	Liechtenstein (40.2%); Austria (26.5%); Estonia (23.0%)
Increase in organic farmland 2020-2021	0.75 million ha	0.77 million ha	France (+0.23 million ha); Spain (0.20 million ha); Romania (+0.11 million ha)
Relative increase in organic farmland	4.4%	5.2%	North Macedonia (+109%); Bosnia&Herzegovina (+47.5%), Iceland (+36.7%)
Land use	Arable crops: 8.4 million ha Permanent crops: 2.0 M ha Permanent grassland: 6.9 million ha	Arable crops: 7.0 million ha Permanent crops 1.8 million ha Permanent grassland: 6.5 million ha	
Top arable crop groups	Cereals: 2.9 million ha Green fodder: 2.6 million ha Oilseeds: 0.9 million ha	Green fodder: 2.5 million ha Cereals: 2.4 million ha Dry pulses: 0.5 million ha	Largest arable areas: France (1.5 million ha); Italy (1.0 million ha); Germany (0.8 million ha)
Top permanent crop groups	Olives: 0.6 million ha Grapes: 0.4 million ha Nuts: 0.4 million ha	Olives: 0.6 million ha Grapes: 0.4 million ha Nuts: 0.4 million ha	Largest permanent crop areas: Spain (0.8 million ha; Italy (0.5 million ha); France (0.2 million ha)
Wild collection area	10.6 million ha	7.4 million ha	Finland (6.9million ha); Russia (0.8 million ha); North Macedonia (0.6 million ha)
Producers	442'274	378'226	Italy (75'874); France (58'413); Spain (52'861)
Processors	87'676	82'500	Italy (23'802); Germany (19'572); France (19'311)
Importers	7'590	6'378	Germany (2'016); France (662; 2019); Italy (579)
Retail sales	54.5 billion euros	46.7 billion euros	Germany (15.9 billion euros); France (12.7 billion euros); Italy (3.9 billion euros)
Growth of retail sales 2020-2021	3.8%	3.6%	Estonia (21.0 %); Luxembourg (15.3 %); Austria (5.8 %)
Organic share of the total market	No data	4.7%	Denmark (13.0 %); Austria (11.6%); Luxembourg (11.0 %)
Per capita consumption	65.7	104.3 euros	Switzerland (424 euros); Denmark (384 euros); Luxembourg (313 euros)
EU Organic imports		2.87 million metric tons (MT)[2]	Netherlands (0.95 million MT); Germany (0.52 million MT); Belgium (0.28 million MT)
Exports to EU		Bananas (0.72 million MT) Oilcake and sugar (0.21 million MT each)	Ecuador (0.35 million MT); Dom. Rep. (0.27 million MT); India (0.21 million MT);

Source: FiBL-AMI survey 2023. For detailed data sources, see annex

[1] Please note that the 2021 data for the European cover the 27 countries that were members of the European Union in 2021. The data exclude the United Kingdom and a direct year-to-year comparison of EU level data shown in previous editions of this yearbook is therefore not possible.

[2] Please note that the 2021 EU organic import data include imports from the UK, which were not included in the 2020 data.

Organic Farming and Market Development in Europe and the European Union

Helga Willer[1], Bernhard Schlatter[2], Jan Trávníček[3], and Diana Schaack[4]

In 2021, the organic sector's development in Europe was characterised by continued growth in all key indicators. However, the organic market did not grow as fast as in 2020, when it increased double-digit due to the pandemic, whereas the organic area increased at a similar pace as in 2020. Both the organic farmland and market will need to grow at a faster rate to reach the 25 percent organic area share goal by 2030, as set out for the European Union by the European Commission (2020) in its Farm to Fork strategy.

Please note that the European Union (EU) data are not comparable to what was communicated in this yearbook's previous editions. All EU data (including historical data) in this volume refer to the EU 27, that is, the 27 countries that were member states of the EU in 2021.

Furthermore, since 2021, the statistical office of the European Union Eurostat, the main data source for many European countries (not only the EU) does not provide the in-conversion data per crop anymore. For this edition, we, therefore, continued to use the previous conversion data in to show the total organic area by crop, as we did not want to communicate a drop in the crop areas when in fact there wasn't one.

1 Key facts and figures: Production and market highlights

Organic farmland

Almost 18 million hectares of farmland were organic in Europe in 2021 – France had the largest area

In Europe, 17.8 million hectares were managed organically in 2021 (EU: 15.6 million hectares). With almost 2.8 million hectares, France became the new number one in terms of farmland under organic management, followed by Spain (2.6 million hectares), Italy (2.2 million hectares) and Germany (1.8 million hectares). More than half of the European organic farmland is in these four countries.

European organic farmland increased by almost 0.8 million hectares

Organic land increased by 0.75 million hectares in Europe (with a major increase in farmland in France, but decreases in Turkey and Ukraine) and by almost 0.77 million

[1] Dr. Helga Willer, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[2] Bernhard Schlatter, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[3] Jan Trávníček, Czech Organics, Staré Město, Czech Republic, www.czechorganics.com
[4] Diana Schaack, Agrarmarkt Informations-Gesellschaft mbH, Bonn, Germany, www.ami-informiert.de

hectares in the European Union (EU), representing an increase of 4.4 percent in Europe and 5.2 percent in the EU. Growth was similar to that in the previous year. To achieve the EU's goal of 25 percent organic farmland by 2030, a higher annual growth rate is needed.

Liechtenstein is the country with the highest organic area share in the world

Organic farmland in Europe constitutes 3.6 percent of the total agricultural land and 9.6 percent in the European Union. In Europe (and globally), Liechtenstein has the highest organic share of all farmland (40.2 percent), followed by Austria, the country in the EU with the highest organic share of agricultural land (26.5 percent). Furthermore, EU countries that are already quite close to the goal include Estonia (23.0 percent) and Sweden (20.2 percent).

In Europe, almost half of the organic farmland is used for arable crops, strong growth of oilseeds

Both in Europe and the European Union, arable land is the most important land use type (almost 50 percent of the organic farmland), followed by permanent grassland (almost 40 percent) and permanent crops (a bit more than 10 percent). In Europe, the key arable crop group was cereals (2.95 million hectares) and for permanent crops olives (0.6 million hectares). The strongest growth in 2020-2021 was noted for oilseeds (+11.4 percent), whereas the highest area share (more than 10 percent) was reached by olives and grapes.

Organic operators

More than 440'000 organic producers in Europe

There were more than 440'000 organic **producers** in Europe (almost 380'000 in the European Union), with the largest numbers in Italy 75'874). The number of producers increased by 5.8 percent in Europe and by 8.2 percent in the European Union.

There were 87'676 organic **processors** in Europe (+3.1 percent compared to 2020) and 82'500 in the European Union (+5.2 percent). The country with the largest number of processors was Italy (23'802).

As in previous years, the number of **importers** grew faster than the number of processors: More than 7'500 (+11.1 percent) were counted in Europe and more than 6'300 in the European Union (+9.2 percent). Germany had the highest number of importers (2'016).

Retail sales

Retail sales passed the 50 billion euro mark – Market growth slowed down

Organic retail sales in Europe were valued at 54.5 billion euros (46.7 billion euros in the EU). The EU represents the second-largest single market for organic products in the world after the United States. With 15.9 billion euros in retail sales, Germany was the biggest market in Europe and the second-largest in the world.

The European and EU organic markets recorded a modest growth rate of not even 4 percent in 2021, thus considerably lower than the 15 percent increase in 2020, which

was characterised by the Corona Pandemic. Also in 2021, some markets showed double-digit growth; the highest growth was observed in Estonia (+21 percent). From 2012–2021, Europe's and the European Union's organic market values more than doubled.

The highest organic market shares and per capita consumption are in Europe

Globally, EU countries account for the highest organic food sales shares as percentages of their respective food markets. Denmark had the highest organic market share globally (13.0 percent). Austria reached 11.6 percent, and Switzerland reached 10.9.

European consumers spent 65.7 euros on organic food per person in 2021 (EU 104.3 euros). Per capita, consumer spending on organic food has doubled in the decade. Swiss and Danish consumers spent the most on organic food (425 and 384 euros, respectively).

Organic imports stagnating – Ecuador was the largest supplier; tropical fruit is the most important commodity group

Data on organic imports to the European Union in 2021 show that 2.87 million metric tons of organic products were imported. Compared to 2020, this is an increase of three percent.[1]

The largest supplier was Ecuador (0.35 million MT) and the key product group was tropical fruits (0.8 million MT), which increased. Decreases were noted for cereals and oilseed imports. The largest EU importer was the Netherlands, which acts as a re-exporter for other European countries.

[1] It should be noted that in 2020, organic imports from the UK, which exported 0.1 million MT into the EU in 2021, were not included. The 2021 data is therefore not strictly comparable with the 2020 data.

2. Organic agricultural land: Area, organic share the of total, growth

2.1 Organic agricultural land

- In 2021, 17.8 million hectares were farmed organically in Europe and 15.6 million hectares in the European Union (Table 63).
- The countries with the largest organic farmland areas were France (16 percent of Europe's organic farmland), followed by Spain, Italy and Germany. More than half of Europe's organic farmland (and almost 60 percent of the European Union's organic farmland) was in these countries (Figure 72).
- More than one-fifth of the world's organic farmland was in Europe (23 percent).

2.2 Organic shares of total agricultural land

- In Europe, 3.6 percent of the agricultural land was organic in 2021, and in the European Union (EU), 9.6 percent (Figure 74).
- In 15 countries (European Union: 13), 10 percent or more of agricultural land was managed organically (Figure 74).
- The countries with the highest organic area shares were Liechtenstein (40.2 percent), Austria (26.5 percent), Estonia (23.0 percent) and Sweden (20.2 percent). Liechtenstein is the country with the highest organic farmland share in the world.

2.3 Growth of organic agricultural land

- In 2021, the organic agricultural land in Europe increased by almost 0.75 million hectares (EU: 0.77 million hectares) or 4.4 percent (EU: 5.2 percent).
- The countries that contributed the most to the growth were France, Spain and Romania, adding more than 500'000 hectares (Figure 77).
- The highest relative increases were in North Macedonia (+109% percent), and Bosnia and Herzegovina (+47.5 percent). As mentioned above, some countries showed a decrease in organic land, most notably Bulgaria (-25.8 percent) (Figure 75).

Table 67: Europe: Organic agricultural land in Europe and the European Union 2021

	Organic area [million ha]	Organic share [%]	Change 2020-2021 [%]	Change 2020-2021 [million ha]	Change 2012-2021 [%]	Change 2012-2021 [million ha]
European Union	15.6	9.6%	5.2%	+0.77	77.1%	6.8
Europe	17.8	3.6%	4.4%	+0.75	69.2%	7.3

Source: FiBL-AMI survey 2023 based on Eurostat and national data sources. For country details, see Table 73

2.4 Conversion status of organic farmland

Most countries provided data on their fully converted and under-conversion areas, but such details are not available for all countries, such as Austria, Germany, Portugal and Switzerland (Table 74). As mentioned above, data on in-conversion area is no longer available for crop details in most countries, because Eurostat has changed its data collection system.

– In Europe, of the 17.8 million hectares of organic agricultural land, at least 11.7 million hectares were fully converted[1] (10.6 million out of 15.6 million hectares in the European Union).
– At least 2.2 million hectares were under conversion (2.1 million in the European Union). The conversion area suggests that, in the future, an increase in the supply of organic products can be expected. However, the conversion area in the European Union has decreased in terms of hectares even though total organic farmland increased.
– By country, the largest in-conversion areas are in Western and Southern European countries. Please note that not all countries provided updated data (Table 74).

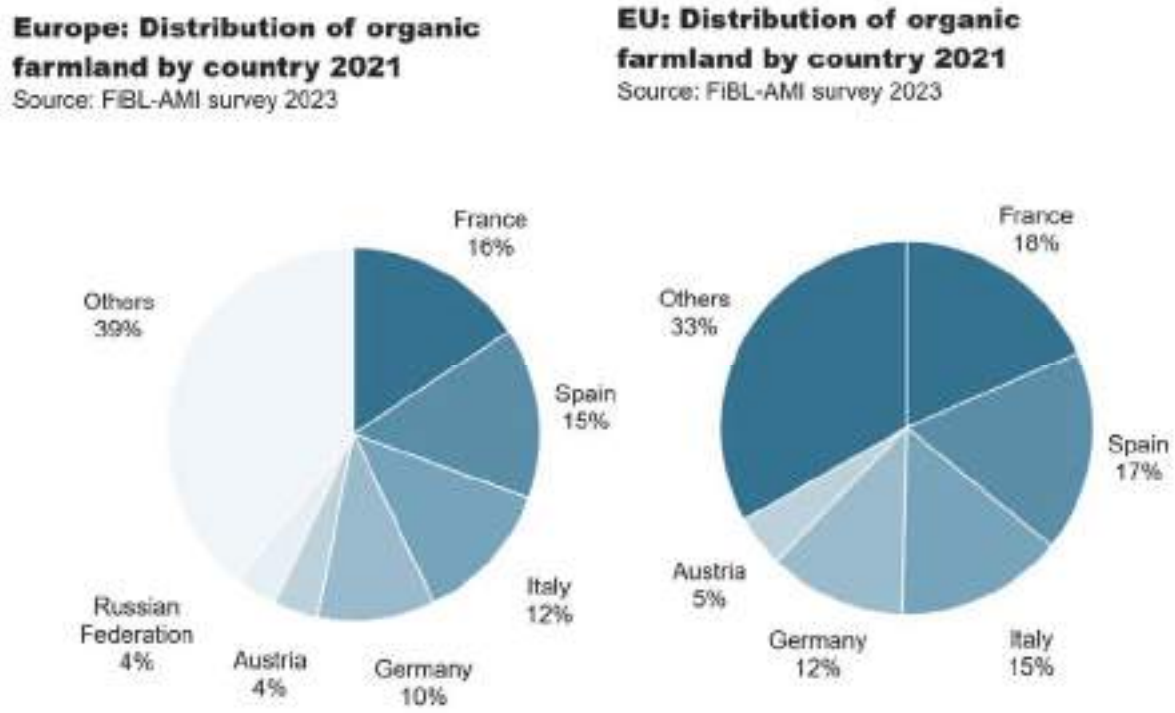


Figure 72: Europe and European Union: Distribution of organic farmland by country 2021

Source: FiBL-AMI survey 2023 based on national data sources and Eurostat
For detailed data sources, see annex

[1] Excluding Austria, Germany, Portugal, the Russian Federation and Switzerland

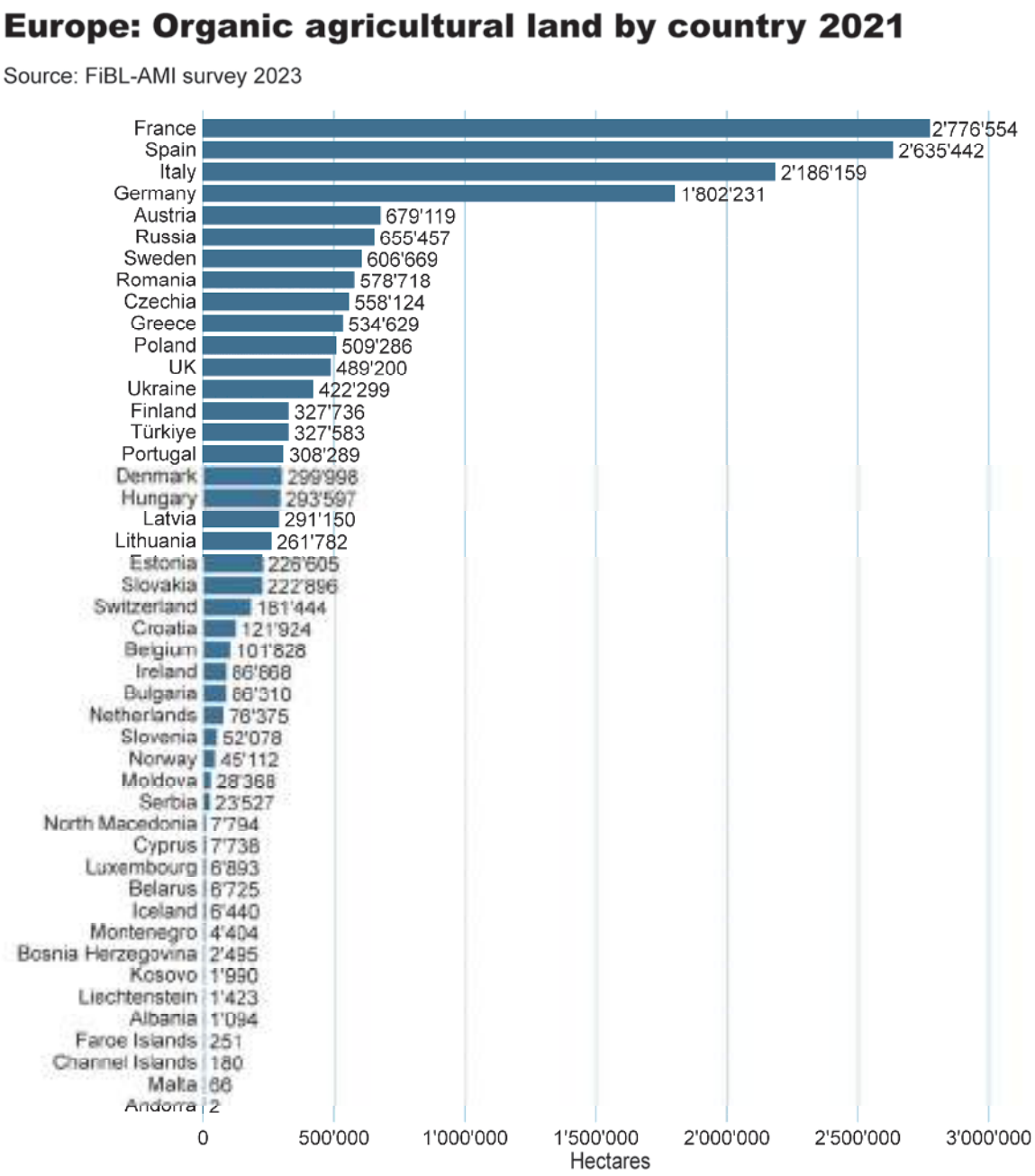


Figure 73: Europe: Organic agricultural land by country 2021

Source: FiBL-AMI survey 2023 based on Eurostat national data sources.
For detailed data sources, see annex.

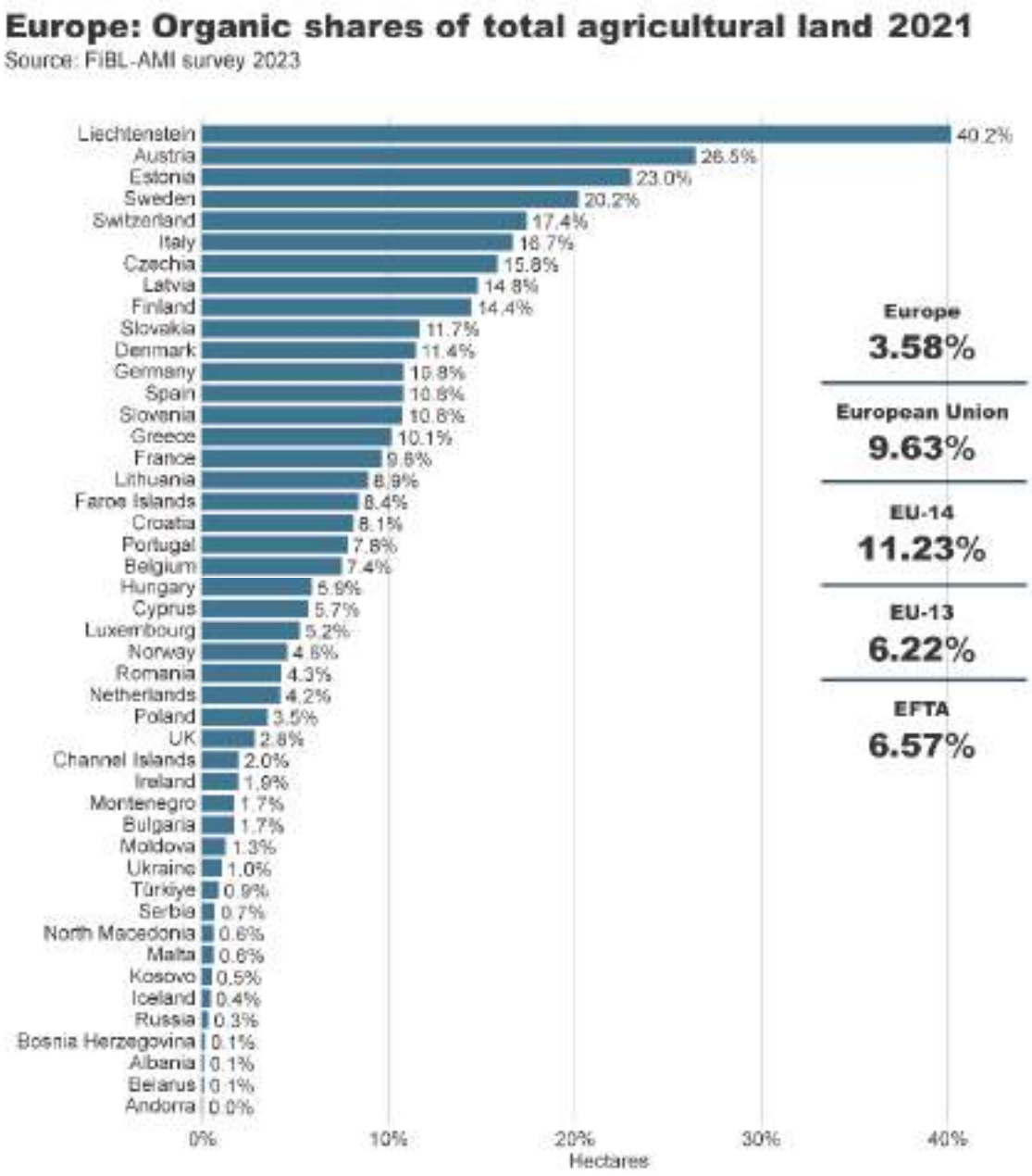


Figure 74: Europe: Organic shares of total agricultural land 2021

Source: FiBL-AMI survey 2023 based on national data sources and Eurostat. For detailed data sources, see annex of this book.
EU Candidates = Candidates and Potential Candidate countries of the European Union; EFTA = European Free Trade Association; EU = European Union; EU-13 = countries, which became members of the European Union in or after May 2004; EU-14 = countries, which were member countries of the European Union before May 2004 (excluding the UK).

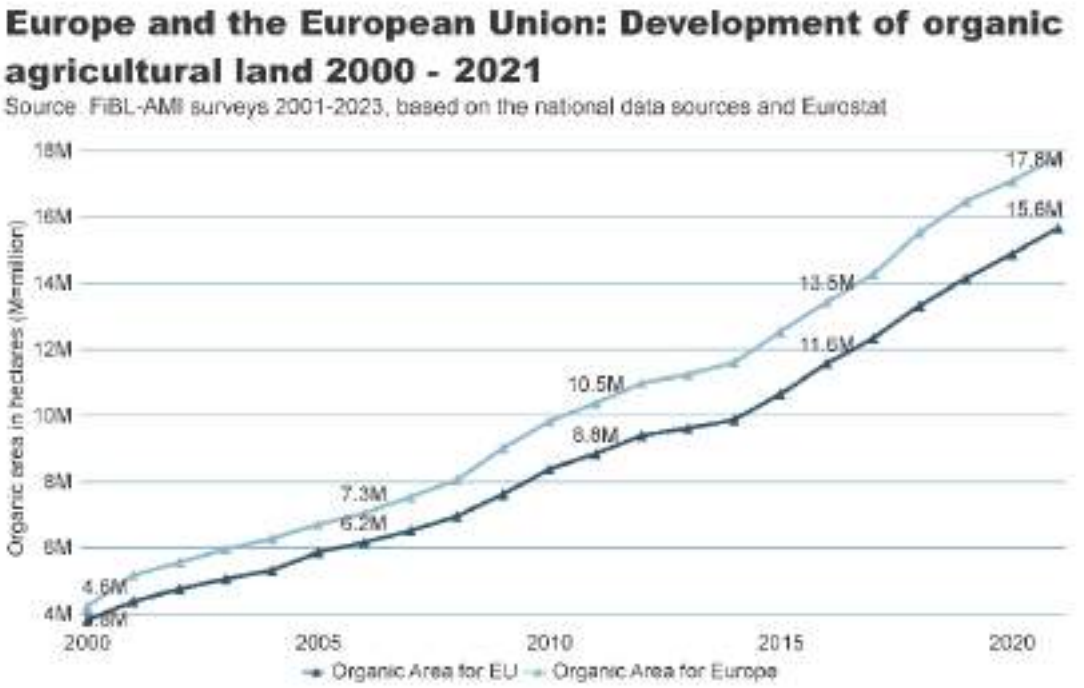


Figure 75: Europe and the European Union: Development of organic agricultural land 2000-2021

Source: FiBL-AMI Surveys 2006-2021 based on national data sources and Eurostat. The data for the European Union covers all countries that were members of the European Union in 2021

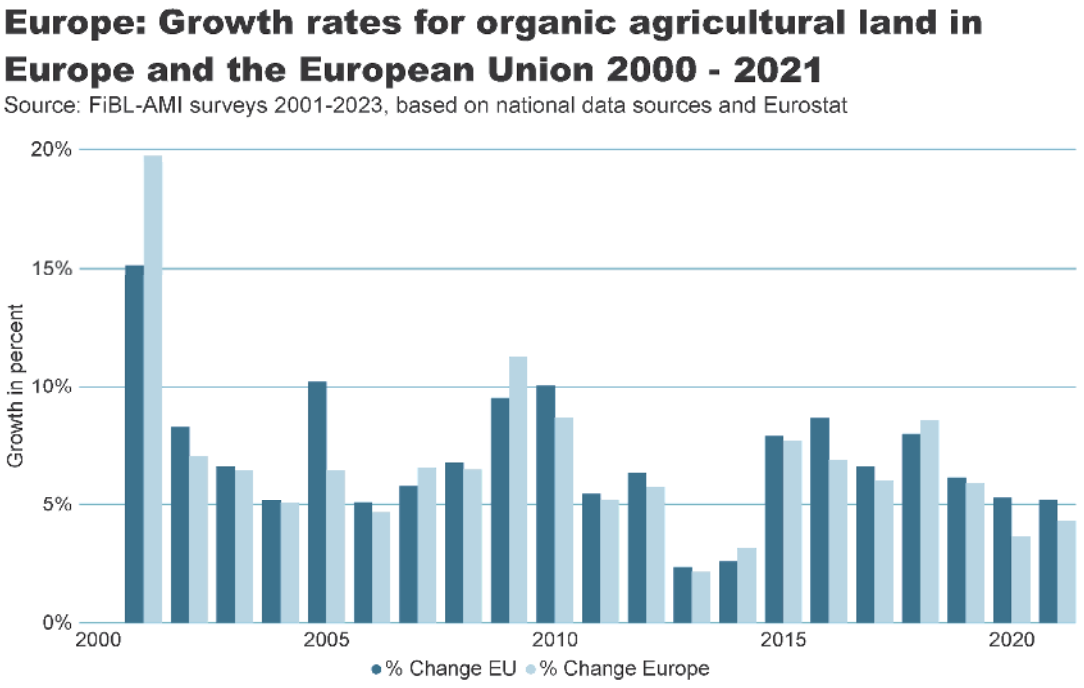


Figure 76: Europe: Growth rates for organic agricultural land in Europe and the European Union 2000-2021

Source: FiBL-AMI Surveys 2002-2023 based on national data sources and Eurostat

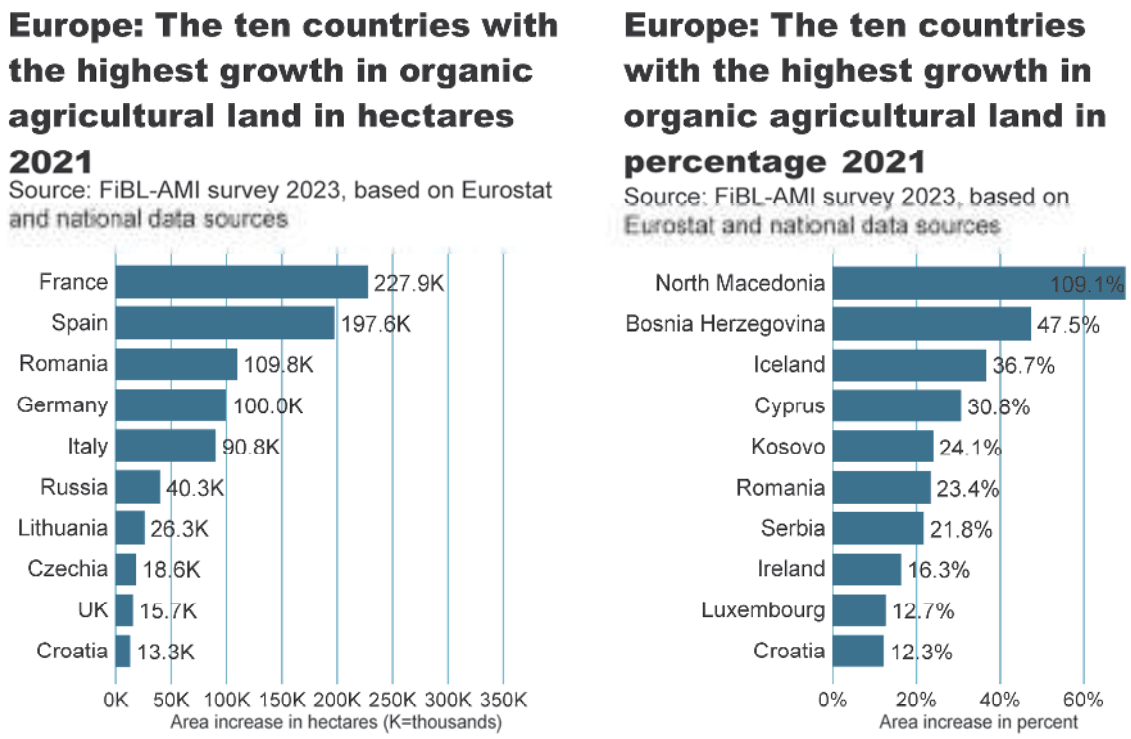


Figure 77: Europe: The ten countries with the highest growth in organic agricultural land in hectares and relative growth in 2021

Source: FiBL-AMI survey 2023 based on national data sources and Eurostat
For detailed data sources, see annex.

3 Land use and crops grown in organic agriculture

3.1 Land use

For all countries in Europe, land use and crop details are available. In this respect, Europe differs substantially from other parts of the world, where often such data is not available. The area for all land use types[1] has grown steadily since 2004.[2] It should be noted, though, that for several European countries, 2021 updates on land use and crops were not or only partly available. Furthermore, in-conversion areas for crops are not available anymore, which means that for those countries, where we receive the data from Eurostat estimates had to be made on the current organic areas by crop (fully converted and in-conversion), using the in-conversion data from the previous years.

Table 68: Europe and the European Union: Land use 2021

Crop group	Europe [Million hectares] (Share of total)	European Union [Million hectares] (Share of total)	Change 2020-2021 Europe/EU [%]	Change 2012-2021 Europe/EU [%]
Arable land	8.5 (3.8%)	7.1 (7.1%)	+3.9%+4.4%	+71.6%/+78.9%
Permanent grassland	6.9 (4.0%)	6.5 (12.7%)	+2.7%/+2.6%	+41.1%/+50.1%
Permanent crops	2.0 (11.5%)	1.8 (14.7%)	+4.8%+/7.2%	83.5%/83.0%
Total	**17.8 (3.6%)**	**15.6 (9.6%)**	**+4.4%/+5.2%**	**60.0%/66.5%**

Source: FiBL-AMI survey 2023 based on national data sources and Eurostat.
Note: Total includes other agricultural land and correction values for double-cropped areas.

Organic agricultural land by land use

- Table 68, Figure 78 and Figure 81 show that **arable land** constitutes a large part of organic farmland, with almost 8.5 million hectares in Europe and 7.1 million hectares in the European Union (47 and 45 percent of the organic farmland, respectively). The arable land share is higher in Europe, as the Russian Federation and Ukraine have large areas for producing cereals, oilseeds and dry pulses. The arable land grew faster in the past years than the organic grassland did.
- **Permanent grassland** accounted for 6.9 million hectares in Europe and 6.5 million hectares in the European Union. By country, the largest permanent grassland/grazing area was in Spain with almost 1.3 million hectares, followed by Germany and France (Figure 81).
- **Permanent crops** constituted 11.5 percent of the total permanent cropland in Europe and 14.7 percent in the European Union, with 2.0 and 1.8 million hectares, respectively.

[1] The main land use types are:
› Arable land crops (mainly cereals, fresh vegetables, green fodder and dry pulses and oilseeds)
› Permanent grassland (pastures and meadows), and
› Permanent crops (fruit trees and berries, olive groves and vineyards).

[2] In 2004, FiBL started its data collection on organic crop and land use data.

Share of total agricultural land

- Compared to total agriculture (based on FAO and Eurostat land use data and not strictly comparable), organic **arable land** constituted 3.8 percent of the total arable land in Europe and 7.1 percent of that in the EU.
- Whereas the organic share of total **permanent grassland** areas was as high as 12.7 percent in the European Union, it was considerably lower in Europe as a whole (4.0 percent).
- **Permanent crops** had the highest organic area shares: 11.5 percent in Europe and 14.7 percent in the EU.

Increase by land use type

- The largest increase in 2021-2021 was in **permanent crops** (a 5.7 percent increase in Europe and a 6.1 percent increase in the EU), mainly because additional organic permanent crop area was reported for Spain.
- **Permanent grassland** increased by 2.7 percent in Europe and 2.6 percent in the EU (Table 68, Figure 79, Figure 80.).
- The **arable farmland** grew by 3.9 percent in Europe and 4.4 percent in the EU. From 2012 to 2021, arable land grew in Europe by 71.6 percent and in the EU by 78.9 percent, thus showing a greater increase than the permanent crops or permanent grassland (Table 68, Figure 79, Figure 80). These numbers show the intensification of organic agriculture as the relevance of grassland is decreasing, whereas arable land is gaining importance.

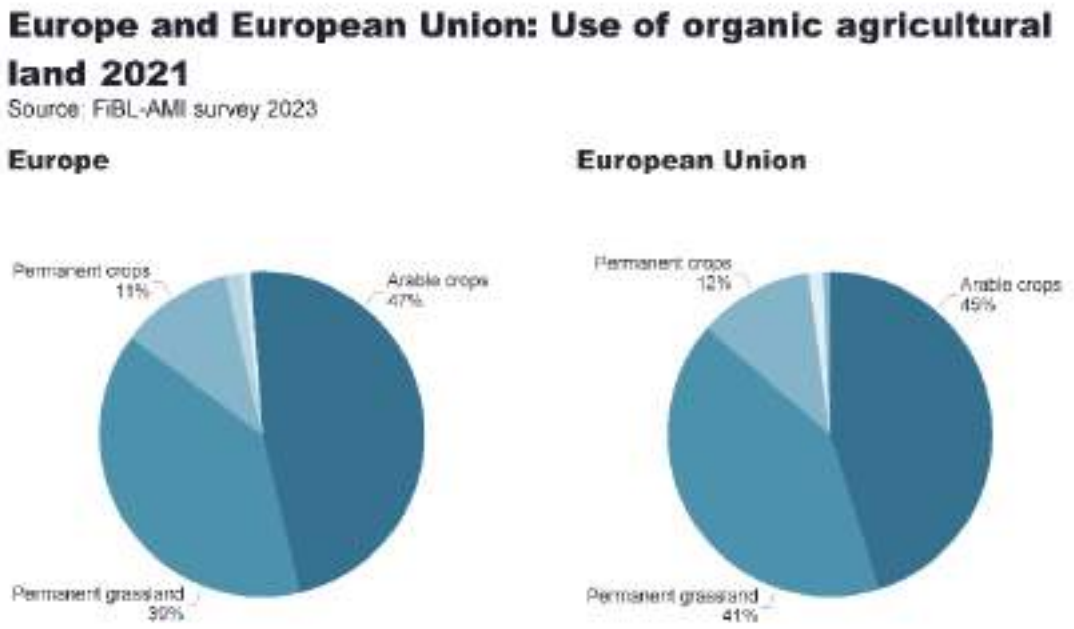


Figure 78: Europe and European Union: Distribution of land use in organic agriculture 2021

Source: FiBL-AMI survey 2023 based on Eurostat and national data sources

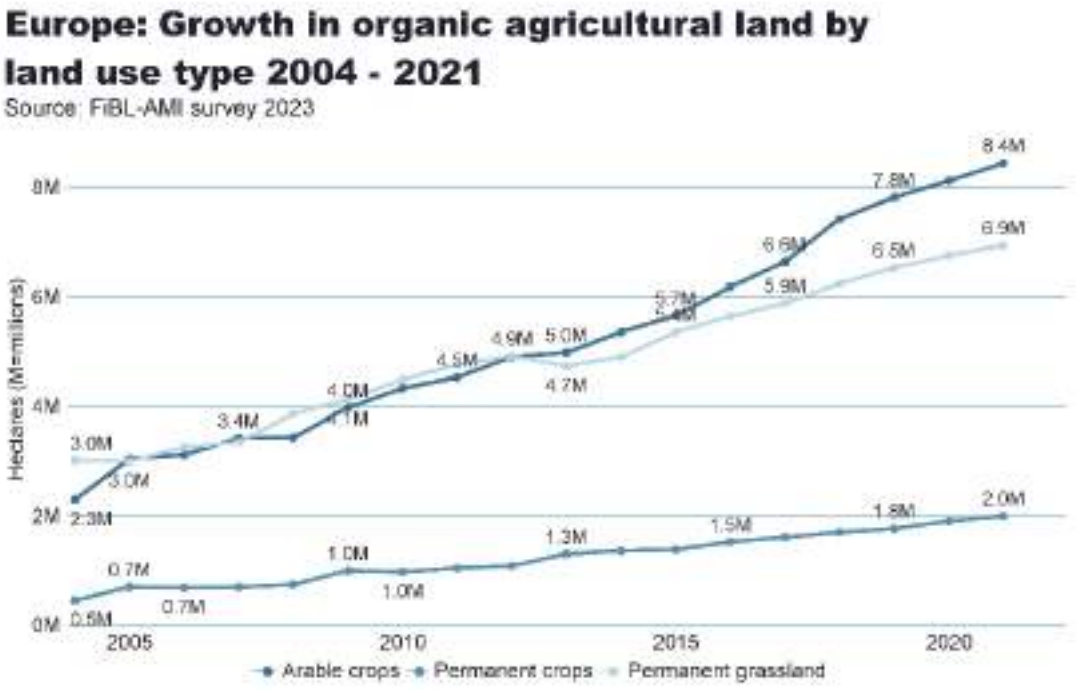


Figure 79: Europe: Growth in organic agricultural land by land use type 2004-2021

Source: FiBL-AMI Surveys 2006-2022 based on national data sources and Eurostat

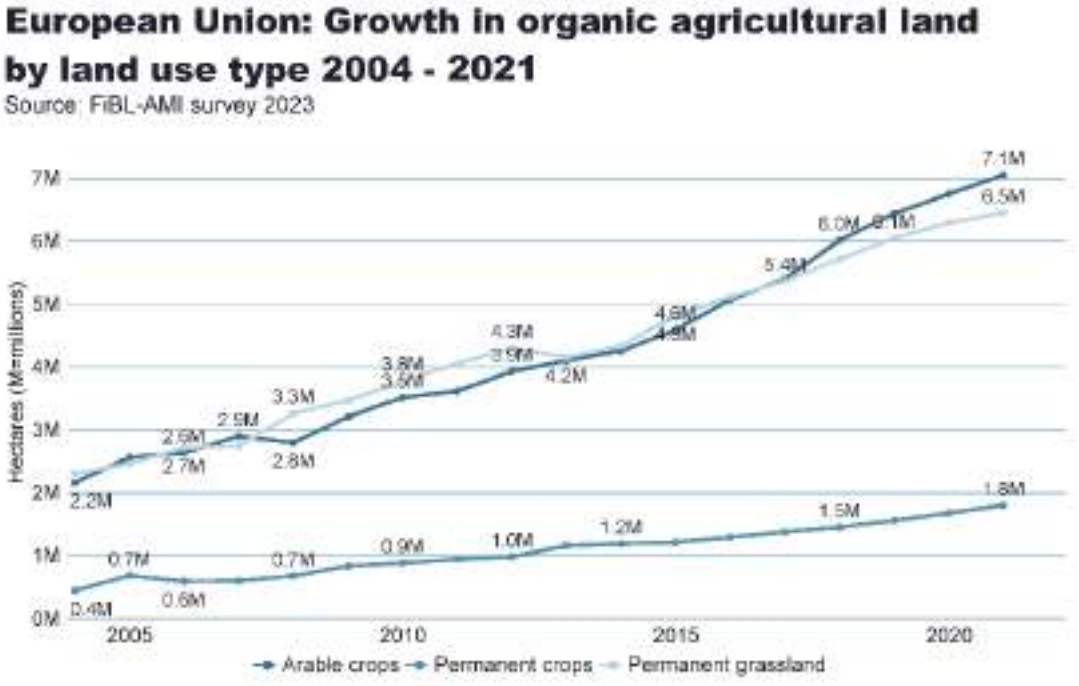


Figure 80: European Union: Growth in organic agricultural land by land use type 2004-2021

Source: FiBL-AMI Surveys 2006-2023 based on national data sources and Eurostat

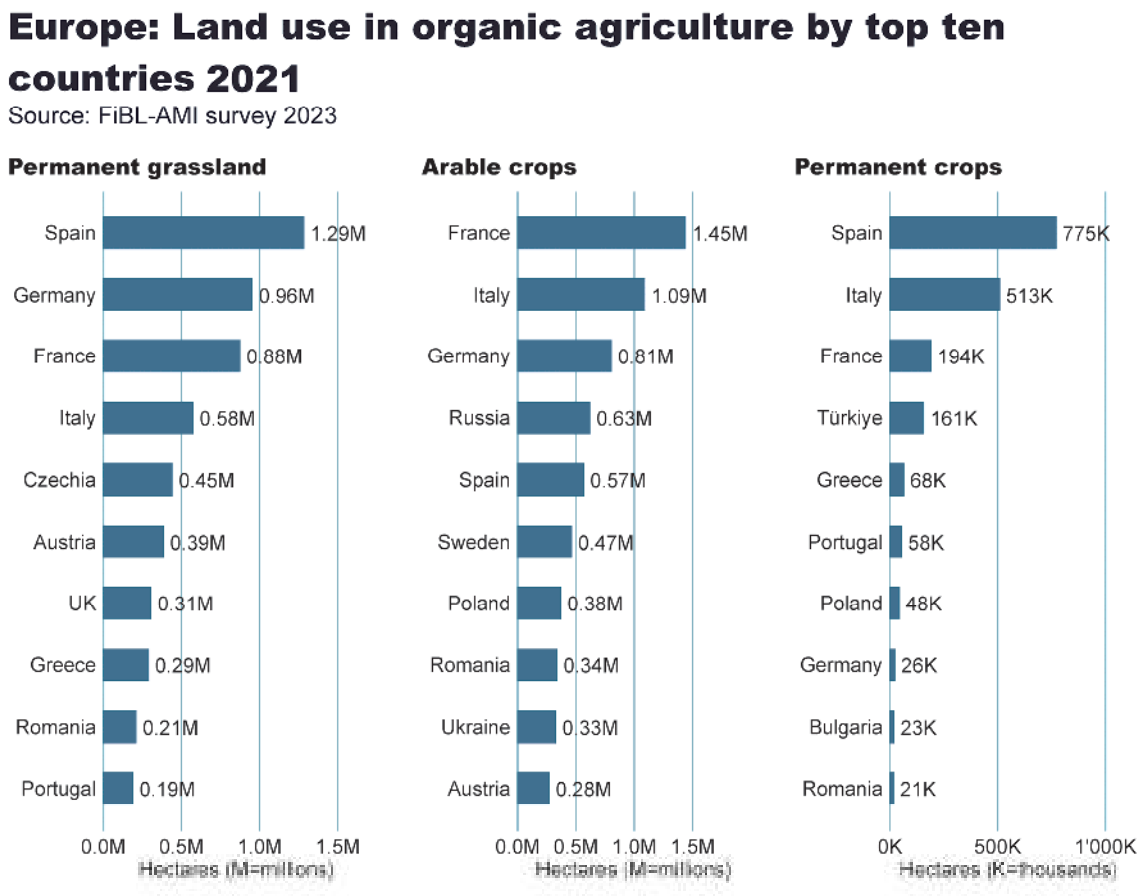


Figure 81: Europe: Land use in organic agriculture - top 10 countries 2021

Source: FiBL-AMI survey 2023 based on Eurostat and national data sources

3.2 Crops grown in organic agriculture

In 2021, all key arable and permanent crop groups showed growth in the European Union (Table 69).

Arable crops

- A large proportion of the organic arable land is used to produce cereals and green fodder, which account for almost two-thirds of the organic arable land.
- Regarding the organic share, dry pulses are the most successful crop; in the European Union, they account for almost one-quarter of the total dry pulses area. In organic farming, they are important for crop rotation and animal feeding. In contrast, they are disappearing in conventional farming, as protein crops for animal feed are imported, and synthetic fertilisers are used.
- Oilseeds showed by far the highest increase in land area. Both from 2020 to 2021 and the 2012-2021 period, the largest growth was noted for oilseeds, which more than trebled in Europe and increased by 400 percent in Europe, with the Russian Federation (soybeans, sunflowers and rapeseed) and Ukraine (soybeans and sunflowers) being the largest producers. Oilseeds are the basis for important

feedstuffs. For more information about crop groups by country, see the crop chapters in this book (page 84) and our online database at statistics.fibl.org.

Permanent crops

– A large part of the permanent cropland is used to grow olives, grapes, and nuts. Olives cover almost one-third of the permanent crop area, and grapes almost one-quarter.
– Both reached an organic share of more than ten percent of their respective totals.
– In 2021, the area for all key permanent crops except nuts decreased (Table 69).[1]

The organic shares for most permanent crops were higher than those for the arable crops. However, it should be noted that the Eurostat data, with which the organic data are compared, do not include all berries or nut types grown in organic agriculture. Thus, a direct comparison is not possible in all cases. For more information about crop groups by country, see the crop chapters in this book (page 84) and our online database at statistics.fibl.org.

Table 69: Europe and the European Union: Key crops/crop group 2021

,	Crop group	Area (ha)		Organic share (%)		Change 2020-2021 (%)		Change 2012-2021 (%)	
		Europe	EU	Europe	EU	Europe	EU	Europe	EU
Arable crops	Cereals	2'947'005	2'407'885	2.2%	4.6%	-2.8%	-1.5%	54.3%	60.1%
	Dry pulses	569'895	495'554	9.8%	23.7%	1.2%	3.7%	125.8%	119.2%
	Fresh vegetables	230'155	202'261	5.1%	10.1%	-3.1%	-5.7%	134.3%	159.6%
	Green fodder	2'624'762	2'461'719	11.5%	11.7%	-2.4%	-2.6%	34.3%	52.2%
	Oilseeds	921'718	452'349	2.4%	4.1%	11.4%	9.1%	378.7%	201.4%
	Root crops	57'889	56'018	0.7%	1.8%	3.7%	7.6%	26.2%	90.2%
Permanent crops	Berries	41'281	36'157	13.3%	24.1%	-9.3%	-4.2%	46.1%	39.1%
	Citrus fruit	54'904	54'113	7.9%	10.4%	-7.8%	-7.9%	116.7%	119.5%
	Fruit, temperate	156'654	135'970	5.7%	11.2%	-9.5%	-3.6%	23.2%	24.2%
	Fruit, (sub)tropical	38'565	21'982	16.0%	13.1%	-10.9%	5.3%	134.6%	281.2%
	Grapes	435'216	422'736	11.2%	13.3%	-0.9%	-0.8%	80.1%	84.0%
	Nuts	437'525	378'595	15.9%	27.5%	16.2%	16.1%	153.7%	148.5%
	Olives	618'525	557'726	10.2%	10.9%	-1.1%	-0.5%	35.5%	32.8%

Source: FiBL-AMI survey 2023 based on national data sources and Eurostat. Totals for arable and permanent crops in other tables include further crop groups
Note: For crop details by country, please check the crop chapter in this book from page 84 and statistics.fibl.org

3.3 Further organic areas

In addition to the agricultural land, there are further organic areas. Large parts of these are wild collection areas constituting 10.6 million hectares (European Union: 7.4 million hectares). The largest wild collection area in Europe (and in the world) was in Finland with 6.9 million hectares (mainly berries). For country details on wild collection areas, see Table 76.

[1] This may be partly attributed to the fact that Eurostat does not provide the total organic area for the crops anymore, only for fully converted. It should be noted though that FiBL made an estimate for the total organic area per crop.

4 Producers, processors, importers and exporters

While data on organic producers are available for almost all countries, this is not the case for processors and importers and even less for exporters. Although data availability is improving, it is still not possible to draw a clear picture of the latter groups over the years. Hence, in Table 70, the development is not shown for the number of exporters.

Table 70: Europe and European Union: Organic operators 2021

	Europe			European Union		
	No.	Growth 1 year	Growth 10 years	No.	Growth 1 year	Growth 10 years
Producers	442'274	5.8%	38.0%	378'226	8.2%	51.8%
Processors	87'676	3.1%	91.1%	82'500	5.2%	93.4%
Importers	7'590	11.1%	132.8%	6'378	9.2%	111.2%
Exporters	3'118	N/A%	N/A	2'404	N/A	N/A

Source: FiBL-AMI survey 2023 based on national data sources and Eurostat. For a breakdown by country, see. annex.

Organic producers

- In 2021, there were more than 440'000 organic **producers** in Europe and almost 380'000 in the European Union (Table 70 and Table 77). The country with the largest number of producers was Italy (more than 70'000 (Figure 84).
- Growth in the European Union (+8.2 percent) was stronger than in Europe as a whole (5.8 percent). Over the decade 2012-2021, the number of producers in Europe increased by 38 percent (EU: 52 percent). A bit more than ten percent of the world's organic farmers are in Europe (Figure 82).

Organic processors and importers

- There were more than 87'000 organic processors in Europe (+2.9 percent compared to 2019) and more than 82'000 in the European Union (+4.9 percent).
- The country with the largest number of processors was Italy.
- The importers continued to be the fastest growing group: More than 7'500 importers (+11.1 percent growth) were counted in Europe and more than 6'300 in the European Union (+9.2percent).
- Germany was the country with the most importers (2'016) (Table 70, Table 77, Figure 83).

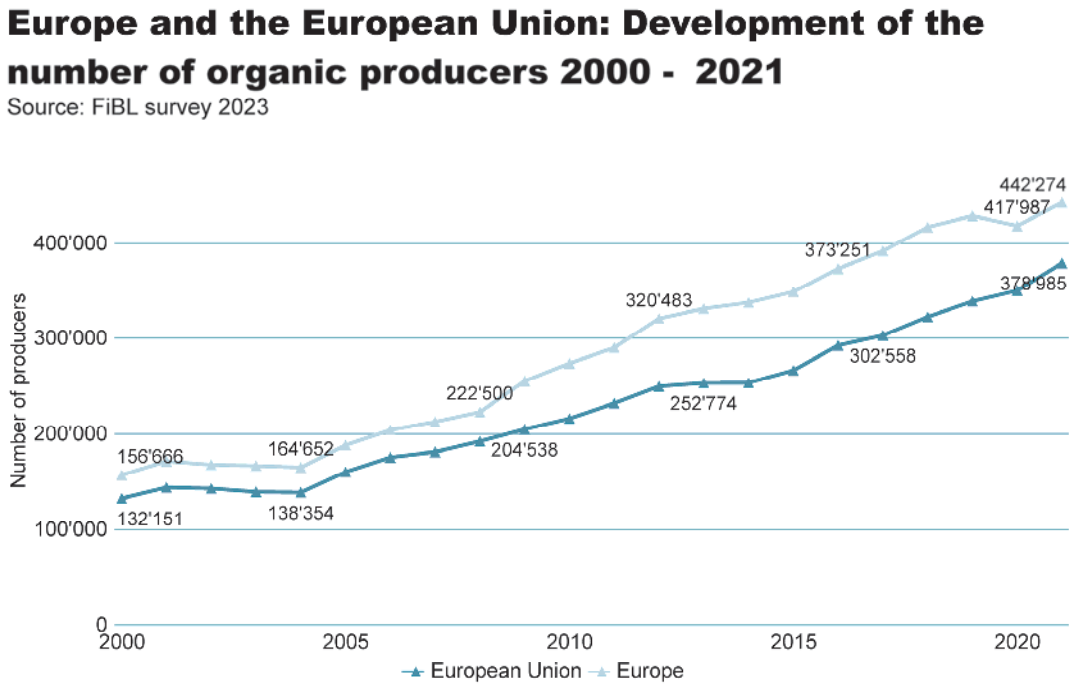


Figure 82: Europe and the European Union: Development of the number of organic producers 2000-2021

Source: FiBL-AMI surveys 2002-2023 based on national data sources and Eurostat

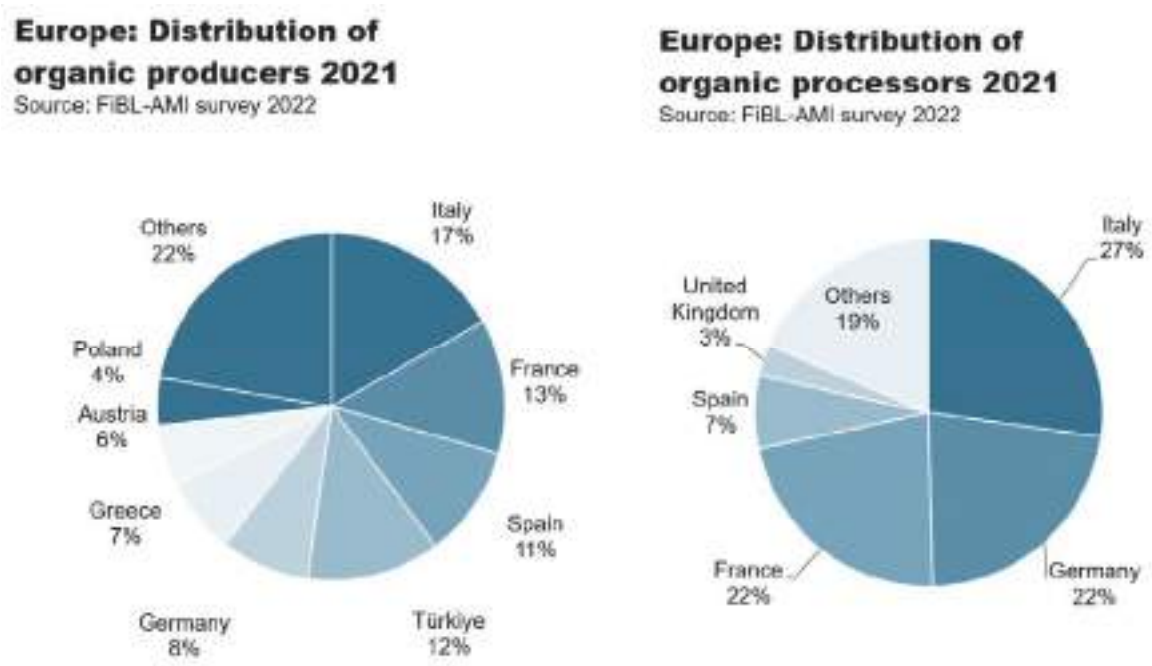


Figure 83: Europe: Distribution of organic producers and processors by country 2021

Source: FiBL-AMI survey 2023, based on national data sources and Eurostat

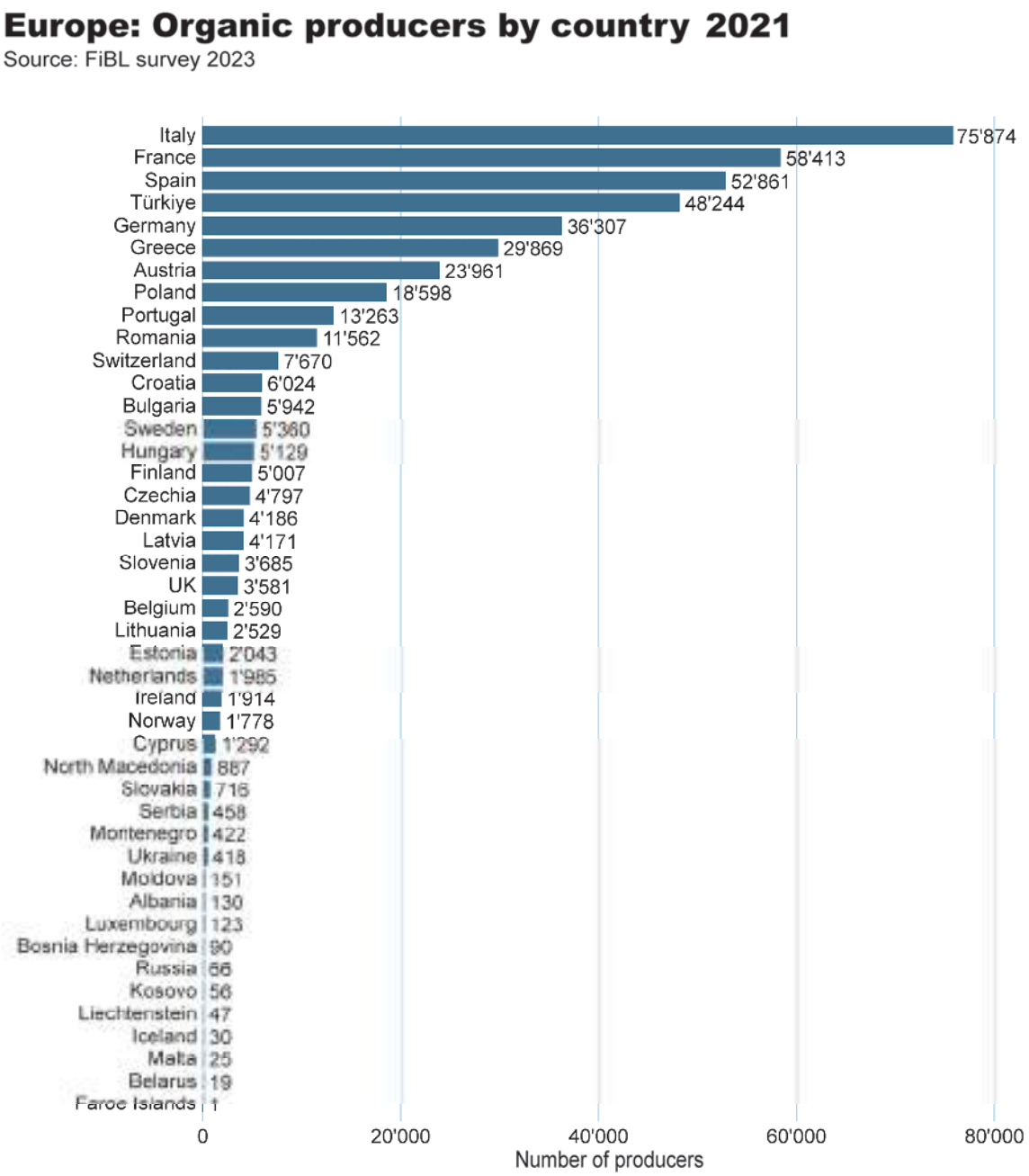


Figure 84: Europe: Number of organic producers by country 2021

Source: FiBL-AMI survey 2023 based on national data sources and Eurostat. For detailed data sources, see annex.

5 Organic imports and exports

The European Union, which is the second-biggest organic market, provided data on its organic imports, showing, for the fourth time, the key import products and key importing countries (based on volume in metric tons MT). Furthermore, the United States has both export and import data (volume and value). Some European countries provide export and import values. As the data is not complete (apart from the EU organic imports), it is difficult to conclude on total values and growth rates for Europe as a whole.

For this chapter we have compiled organic import volumes (metric tons) into the EU and US as well as import and export values (in million euros). Available data is displayed in Table 79.

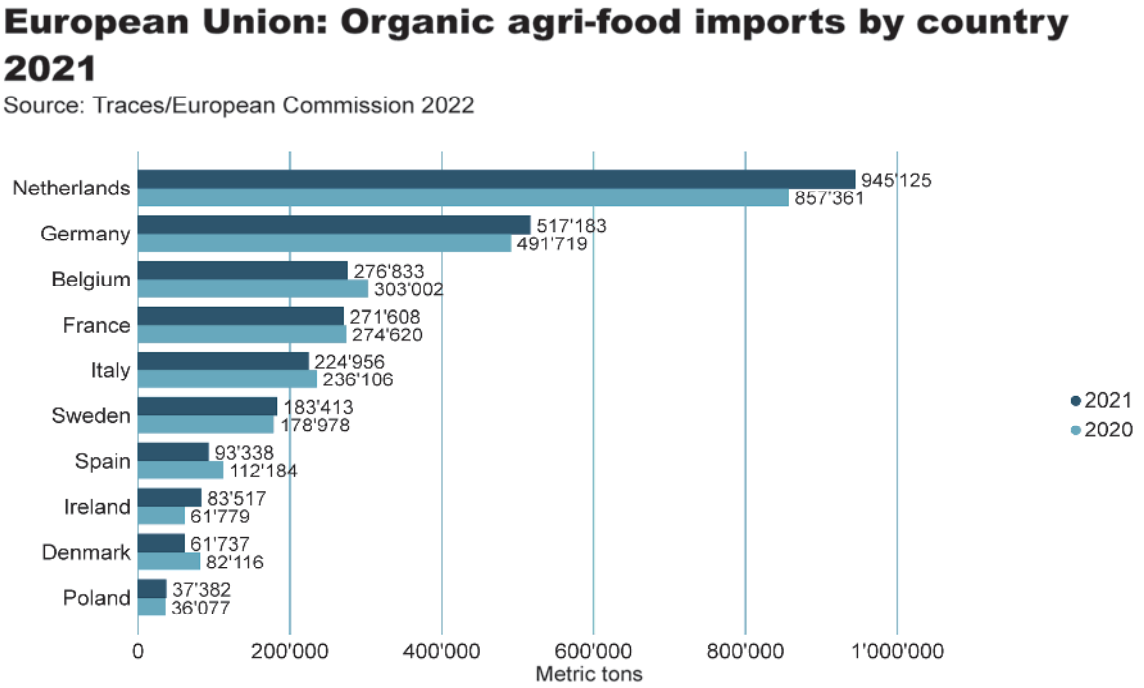


Figure 85: EU organic imports: Top 10 EU importers of organic products

Source Trace/European Commissions

- **Import volumes**: In 2021, the EU imported a total of 2.87 million MT of organic agri-food products.
- **By importing country**: The biggest importers (based on import volume in metric tons) were the Netherlands (0.95 million MT), followed by Germany and Belgium. For the Dutch imports, it should be noted that a large part of the goods is resold to other EU countries. For a full list, see Table 80.
- **Increase in 2021:** Compared to 2020, EU organic imports increased by 2.8 percent (Figure 54). It should be noted though that in 2020, EU organic imports from the UK, which constituted 0.1 million MT in 2021, were not yet included; thus the 2020 and 2021 data are not strictly comparable.

- **EU organic import volume by product:** Bananas were the most important product with 0.72 million MT (one-quarter of all EU organic imports), followed by oil cakes and sugar with 0.2 million MT each.
- **European export volumes:** According to the combined US and EU data, a volume of at least 0.68 million metric tons was exported to the United States from European countries, with 0.24 million MT coming from Ukraine.
- **European export and import value:** Not much data is available on this. Italy showed the largest export value (2.9 billion euros), and France had the highest import value (2.8 billion euros). No such data was available from Germany, the biggest market in Europe.
- **EU import volume by exporting country:** Ecuador was the biggest supplier of organic agri-food products to the EU, with 0.35 million MT; this corresponds to 12.0 percent of the total organic import volume. The largest increase in volume was noted for India (an increase of more than 30'000 MT). The UK, for which export data to the EU had not been available previously, supplied more than 100'000 MT of products.

For more information, see the contribution about EU organic imports on page 137.

6 Organic retail sales

In 2021, the organic market in Europe grew to 54.5 billion euros (European Union: 46.7 billion euros), but at a considerably slower rate than in the previous years, and other than in the past the market grew slower than the organic farmland. Unfortunately, not all countries provide data on their domestic markets regularly (Table 78), and it may be assumed that the market is larger than indicated by the figures in Table 71 and Table 78.

Table 71: Europe and the European Union: Organic retail sales 2021: Key data

	Retail sales [Million €]	Per capita consumption [€]	Growth 2020-2021 [%]	Growth 2012-2021 [%]
Europe	54'539.0	65.7	3.8%	140.2%
European Union	46'665.0	104.3	3.6%	148.8%

Source: FiBL-AMI survey 2023 based on national data sources. For country details, see annex.
Please note that the EU number is not comparable to what was communicated in previous years as only the countries that were a member of the EU in 2021 were included.

6.1 Size of the organic market

Germany continued to be the largest market in Europe (almost 16 billion euros) (Figure 87), and, after the United States, it is the second biggest organic market in the world. France holds second place in Europe with 12.7 billion euros Figure 87).

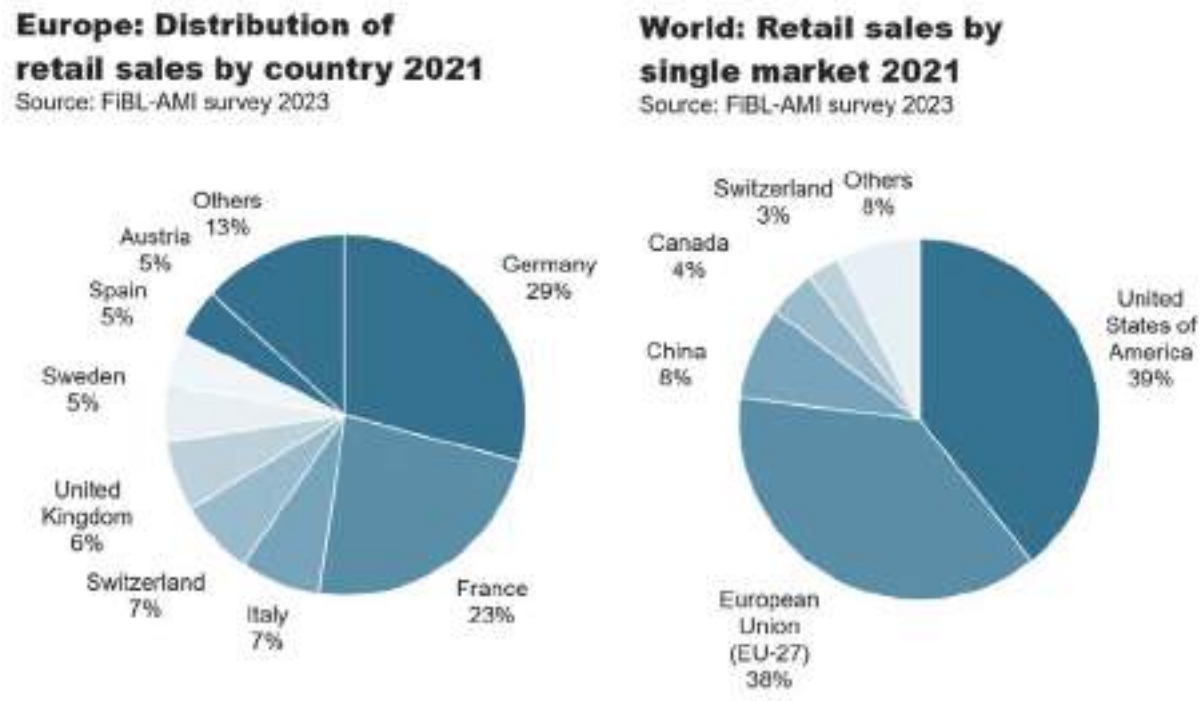


Figure 86: Europe: Distribution of retail sales by country and by single market worldwide 2021

Source: FiBL-AMI survey 2023 based on national data sources

Comparing organic markets by single markets, the United States had the lead. Thirty-nine percent of global organic retail sales were in the United States (48.6 billion euros), followed by the European Union (46.7 billion euros; 38, Figure 86).

Comparing retail sales by continent, Europe had 44 percent (54.5 billion euros), whereas North America constituted 43 percent (53.9 billion euros). Thus the picture has changed compared to 2020, when North America had the lead; a change, which must partly be attributed to the fluctuating euro – US dollar exchange rate.

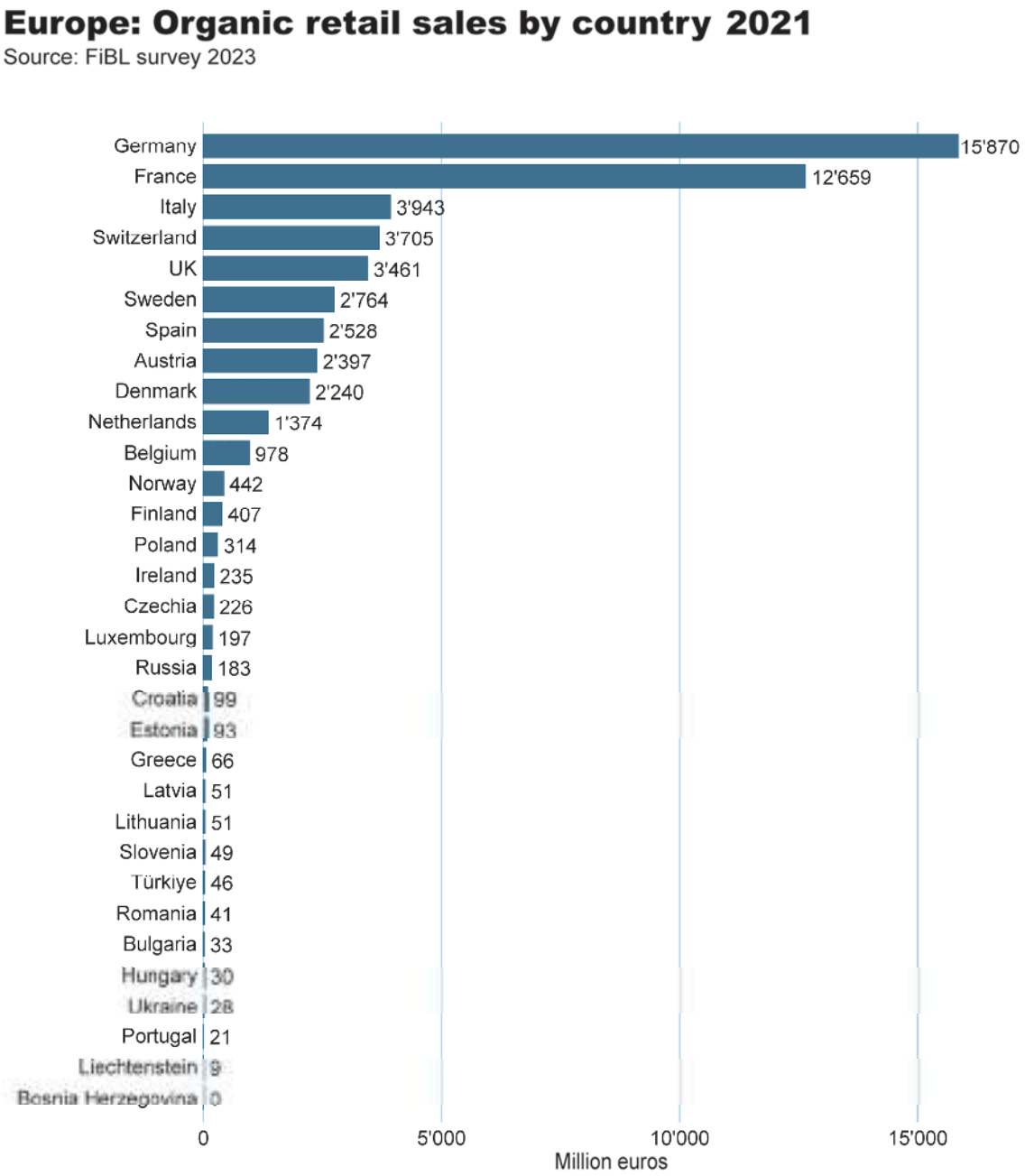


Figure 87: Europe: Retail sales by country 2021

Source: FiBL-AMI survey 2023 based on national data sources. Please note that 2021 data were not available for all countries. For detailed data sources, see annex.

6.2 Growth of the organic market

The organic market grew in Europe and the EU by approximately 3.8 and 3.6 percent, respectively, the lowest growth rate in more than a decade (see section 6.7 of this subchapter). From 2012 to 2021, the organic market more than doubled in size (Figure 88).

Most countries for which new data were available showed growth: most of these grew single digits (Figure 89). An exception were Estonia and Luxembourg which grew by 21 and 15 percent, respectively (Figure 89, Table 78).

6.3 Per capita consumption of organic food

Like in the previous years, the highest per capita consumption of organic food was in Switzerland (425 euros) and Denmark (384 euros). Switzerland is the number one in the world in terms of per capita consumption. Nine countries had a per capita consumption of more than 100 euros in 2021 (Figure 90, Table 78).

The continual growth in consumer interest is well documented by the development of per capita consumption, with a specific notable increase in 2020 but slower growth in 2021 (Figure 91). The per capita consumption in Europe rose to 65.7 euros and to 104.3 euros in the European Union.

In Central Eastern European countries, consumer spending is still low (Table 78). There are indications that markets are currently developing fast, especially in the Baltic countries.[1]

However, retail sales data are scarce for some countries and not regularly updated. Whereas the availability and accessibility of the area and operator data is good, the Czech Republic and Estonia are the only countries with a permanent collection system for retail sales data.

6.4 Organic market shares

The organic share of retail sales shows the importance of the organic market in a given country. As in the past, the highest market shares were reached in Denmark (13 percent, highest organic market share in the world), Austria (11.6 percent) and Switzerland (10.9 percent) (Figure 92, Table 78). Market shares of individual products and product groups can be far higher; these data are provided in Table 72.

In the past, in many countries, the total food market was not growing, and food prices were decreasing, which made organic shares of the total market grow even faster. The pandemic interrupted that development and caused the general food markets to grow rapidly. Furthermore, the war in Ukraine, the high energy costs and the increased cost of living have spurred inflation in many countries and conventional food has become significantly more expensive again. This development has also had an effect on the organic market shares.

[1] Estonia, Latvia and Lithuania.

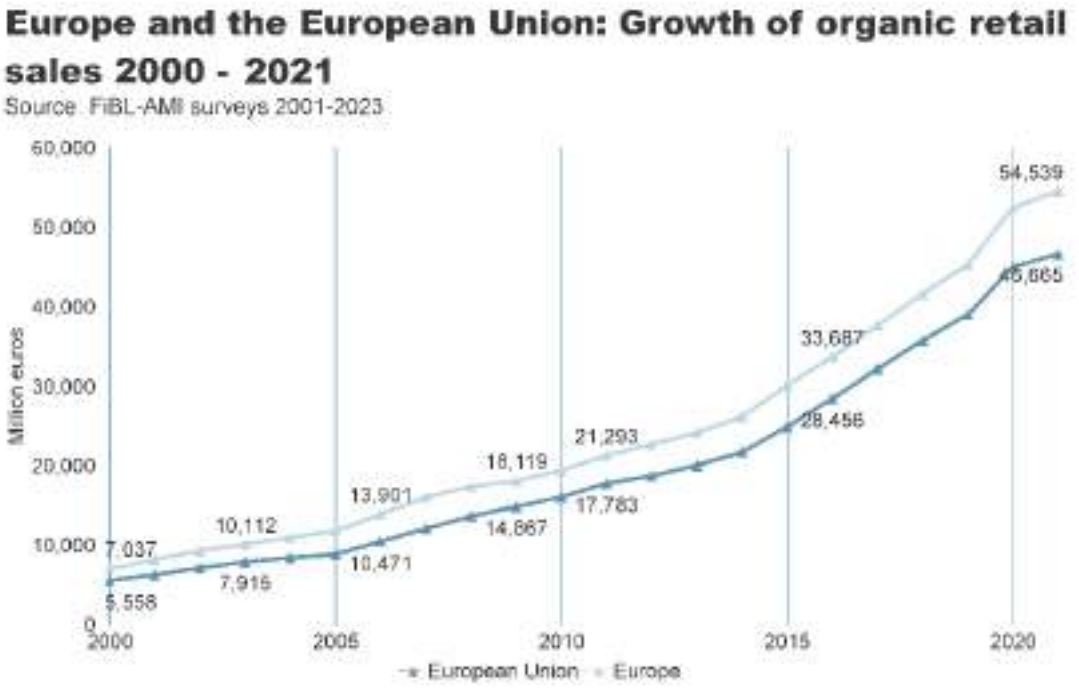


Figure 88: Growth of organic retail sales in Europe and the European Union, 2000-2021

Source: FiBL-AMI surveys 2004-2022, and OrganicDataNetwork Surveys 2013-2015

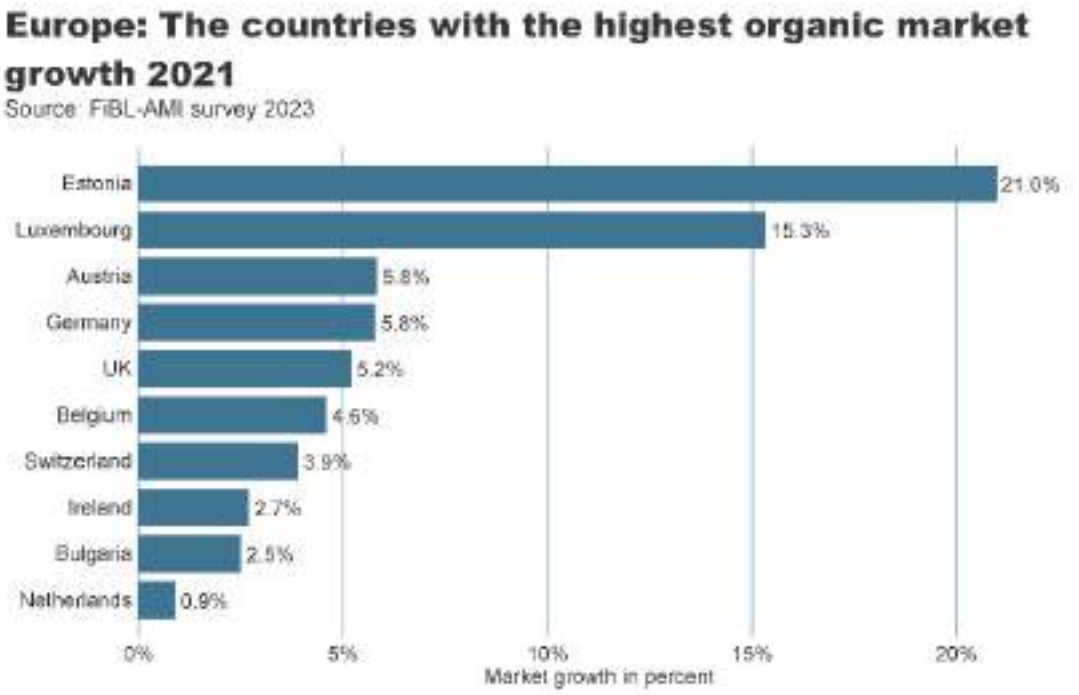


Figure 89: Europe: The countries with the highest organic market growth 2021

Source: FiBL-AMI surveys 2022. For detailed data sources, see annex.

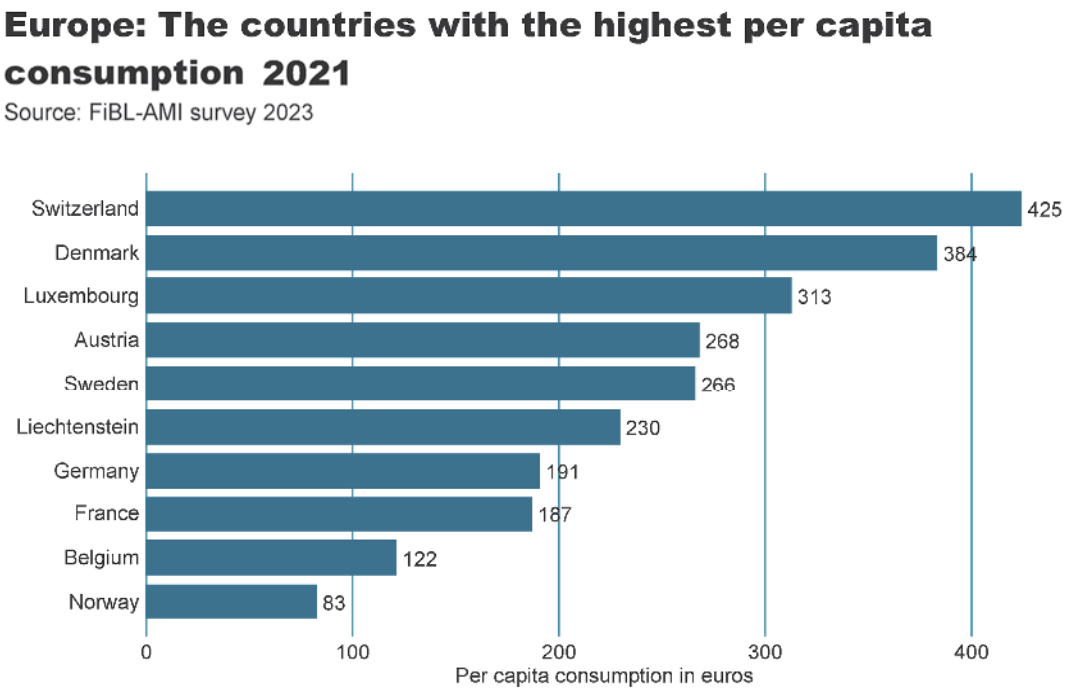


Figure 90: Europe: The countries with the highest per capita consumption 2021

Source: FiBL-AMI survey 2023 based on national data sources. For detailed data sources, see annex.

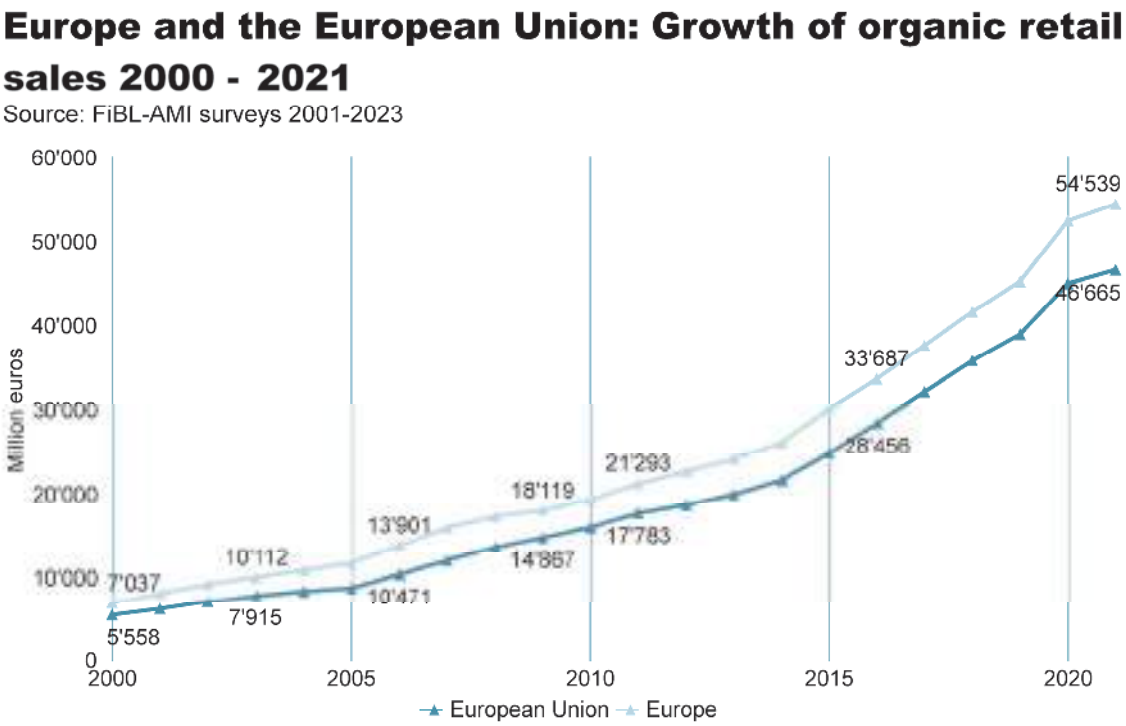


Figure 91: Europe: Growth of the per capita consumption 2010-2021

Source: FiBL-AMI survey 2023 based on national data sources. Calculation based on Eurostat population data. For detailed data sources, see annex.

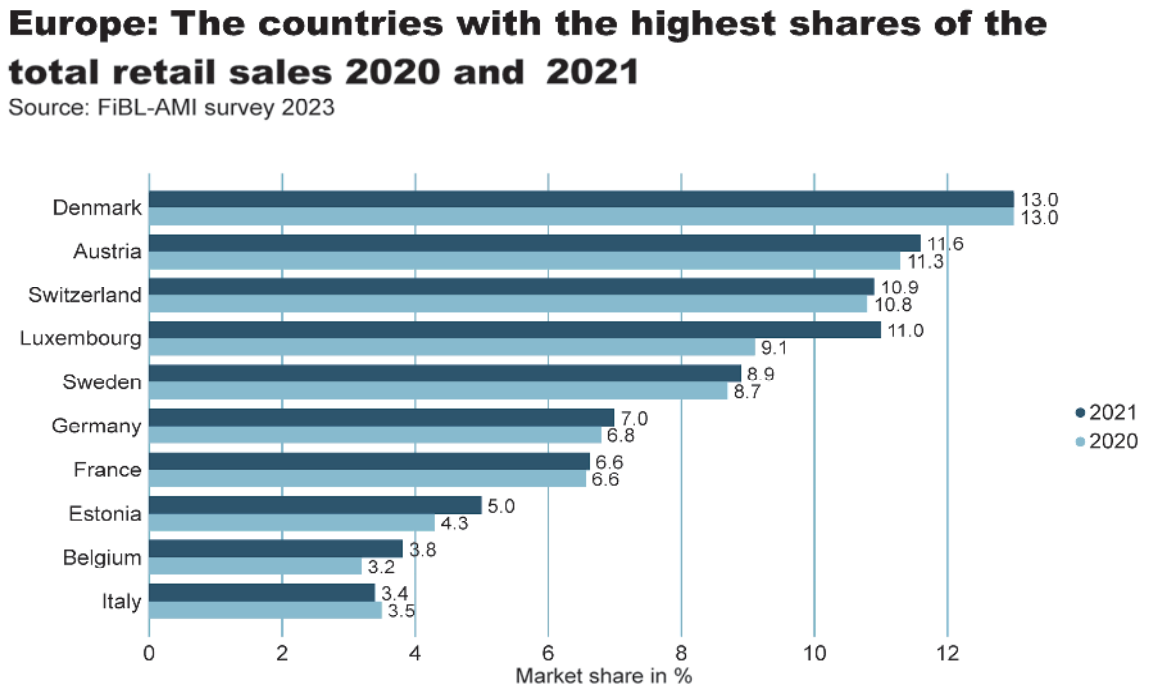


Figure 92: Europe: The countries with the highest shares of the total retail sales 2020 and 2021

Source: FiBL-AMI survey 2023 based on national data sources. For detailed data sources, see annex.

6.5 Comparison of organic products and product groups with the total market

While the organic share of the total market is an important indicator, it is also important to look at the organic market shares that individual products can have. In many countries, organic eggs are one of the success stories within the total retail market, and they reach impressive proportions of the entire egg market. Table 72 shows that, in Denmark and France, eggs reach organic market shares of more than 30 percent (in value). On the other hand, they are the first organic product with a saturated market resulting in oversupply as observed in Germany.

Organic fruit and vegetables continue to be highly popular purchases among European organic consumers. Organic vegetables have the highest market shares after eggs, representing 10 percent or more of the sales value of all vegetables sold. Individual products can reach even higher market shares. For example, fresh carrots have a market share of more than 30 percent in Germany and of almost 60 percent in Denmark. In Sweden and Switzerland, organic dairy products are reaching organic market shares of 10 percent or higher. On the other hand, products like organic beverages (except wine) and meat (especially poultry) have low market shares in many countries. These products are often highly processed and very cheap on the conventional market. Another factor is that many organic consumers tend to eat little or no meat.

Table 72: Organic shares for retail sales values (euros) for selected products 2021

	Austria	Belgium	Czech Republic (2020)	Denmark (2021)	Finland	France (2019)	Germany	Italy (2019)	Netherlands	Spain (2017)	Sweden	Switzerland	UK (2020)
Baby food					24.0	26.9		4.8			25.9		59.6
Beverages			0.5	18.7 (juice)		5.5		3.0				4.5	
Bread & bakery products		5.1 (bread)	0.9			5.3	7.7 (bread)	4.0	0.9		0.9	26.3 (bread only)	0.3
Eggs	23.9	21.8		47.4	20.0	37.2	25.7	19.8	17.0	2.9	22.2	29.2	8.8
Fish and fish products						3.1			1.4	0.6			1.1
Fresh vegetables	20.5	8.8			5.0	7.6	13.7	4.7		3.3		23.8	4.8
Fruit	14.2	6.9				8.8	10.1	6.6		1.7		19.4	3.0
Vegetables and fruit			1.6		7.0	8.2		7.7	4..5			21.6	0.5
Meat and meat products	6.2 (meat)		0.4	13.6 (beef)		3.2	5.9 (meat)	2.9	3.3	1.2	2.9	6.2 (incl. fish)	1.6
Milk and dairy products	14.1	4.1	1.6			5.8		3.6	4.0	1.1		11.4	3.5
- Butter	12.1			25.0		7.4	7.5	2.8					
- Cheese	11.1			11.3	2.0	2.6	6.1	1.0			1.9	8.4	1.1
- Milk	30.2	4.1		44.6	4.0	15.7	17.1	8.1			14.1	26.8	5.1
- Yoghurt	26.3.3					9.1	10.4	6.1					8.2

Sources: FiBL-AMI survey 2023, based on data from Austria: RollAMA based on GfK, Belgium: Biowallonie; Czech Republic: UZEI; Denmark: Organic Denmark based on Kauzas Houshold panels, provided by Danish Agriculture & Food Council (please note that the data source has changed and a direct year-to-year comparison is not possible), Finland: Pro Luomu; France: Agence Bio, for some products supermarket sale; Germany: Agricultural Market Information Company AMI based on GfK; Italy: supermarkets and discounters only, data provided by_Marche Polytechnic University; Netherlands: Bionext; Norway: Sweden: Ekologiska Lantbrukarna, Ekomatcentrum and Organic Sweden; Switzerland: Bio Suisse based on Nielsen; UK: Soil Association. Note: Due to classifications and nomenclatures differing from country to country, it is not possible to supply data for all product groups, even if data for individual products may be available. Not all countries have data on the market shares of organic products.

6.6 Marketing channels in organic agriculture

Some countries are in a position to break down their retail sales data by marketing channel. Wherever possible, the figure for catering sales was deducted from the figure for the total organic market (Table 78).

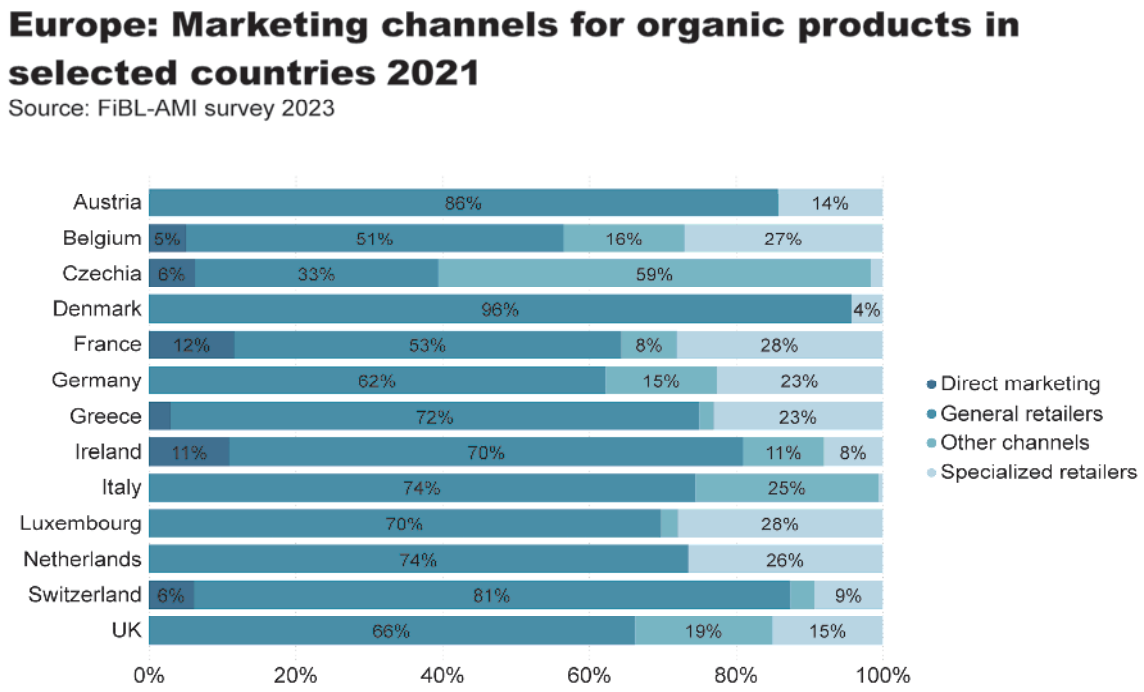


Figure 93: Europe: Marketing channels for organic products in selected countries 2021

Source: FiBL-AMI survey 2023 based on national data sources.
For detailed data sources, see annex.

Figure 93 shows that the importance of the various retail marketing channels (excluding food service/catering) differs from country to country. In the past, countries with strong involvement by general retailers showed steady organic market growth (e.g., Austria, Denmark, Sweden, Switzerland, and the United Kingdom). France and Italy are good examples of countries with strong market growth, where specialised retailers play a significant role, even though their importance is decreasing, as shown in Figure 94.

In all countries displayed in Figure 94, strongest growth in the 2017-2021 period was noted for the general retailers. In Germany for instance, supermarkets have become the driving force in the market, whereas specialised retailers face more and more competition. While in 2014, 33 percent of all organic products were sold in organic food shops, this number decreased to 22.6 percent in 2021. Supermarket chains have founded partnerships with organic associations and sell products with their brands.

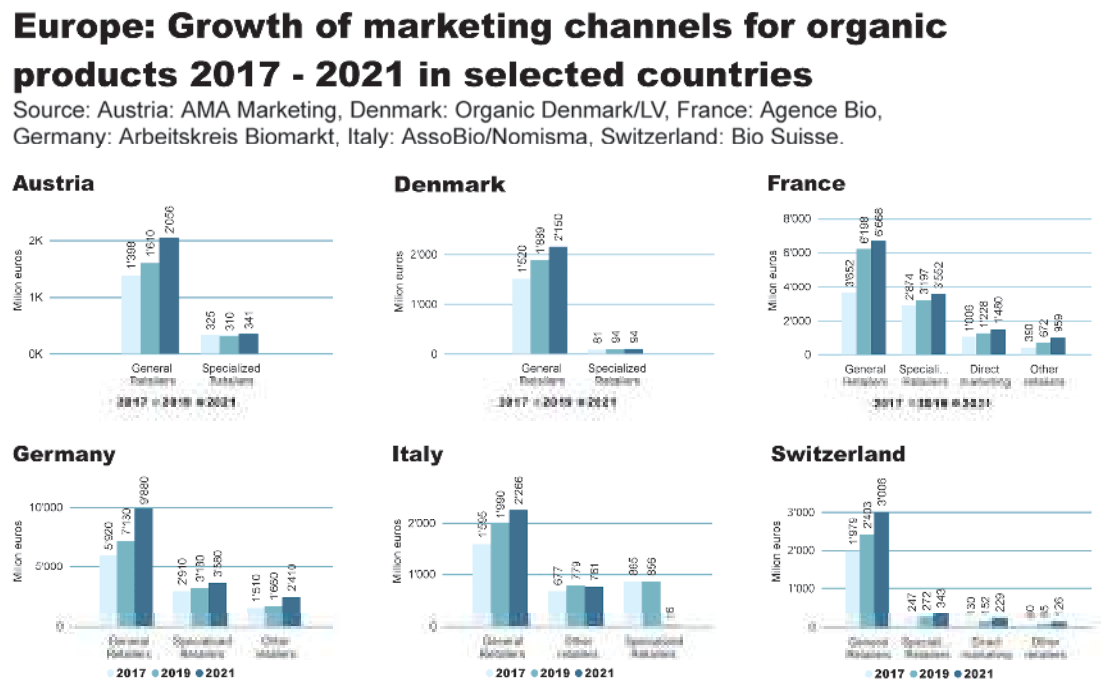


Figure 94: Europe: Growth of marketing channels for organic products 2017-2021 in selected countries

Sources: Austria: AMA Marketing, Denmark: Danish Agriculture & Food Council, France: Agence Bio, Germany: Arbeitskreis Biomarkt/AMI, Italy: Nomisma, Switzerland: Bio Suisse.

6.7 The European organic market: Effects of the pandemic and the war in Ukraine

Effects of the pandemic

The COVID-19 pandemic has tremendously impacted most people's purchasing behaviour and has given the organic market an unprecedented upturn in many countries. People have been staying home to eat, and out-of-home meals have been reduced to a minimum. On the other hand, in general, food sales in supermarkets have increased rapidly. Organic food sales have accelerated even faster. When consumers have the choice, which they don't have in canteens and restaurants, they more often buy organic products; for example, in 2020, the growth of the organic market in Germany was twice as strong as the general food market. Health, environment and climate change have become big issues among the population – even more so during the pandemic.

Many shops have become innovative in selling food, adapting to consumer preferences for not leaving home or going too far for shopping. Online sale options, like subscription boxes for organic food, have grown tremendously along with other forms of contactless shopping, such as "Click and Collect."

Post pandemic developments

The pandemic continued to boost organic markets in many European countries in 2021, but not to the same extent as in the first Corona year of 2020, when the market grew by 15 percent. The level reached in 2020 was maintained (3.8 percent growth in Europe).

In addition, normal life returned in many countries in the second half of the year. People cooked less at home and travelled more.

- Estonia achieved the biggest growth in 2021 with a 21 percent increase as the range of products offered in stores was significantly expanded. Luxembourg also achieved double-digit growth of 15 percent.
- Many countries, such as Belgium, Austria, Germany, Switzerland and the United Kingdom, achieved growth rates of around 4 to 6 percent.
- Some countries showed stable to slightly negative developments: Denmark, France, Finland, Italy and the Netherlands.
- In Sweden, the market shrank for the second year in a row, this time by 5 percent.

The war in Ukraine and its impact on the organic market

After two successful years, organic market growth in Europe turned around in 2022 with the start of the war in Ukraine. The cost of living has skyrocketed in many countries, with inflation reaching unprecedented levels of 10 percent and more in the second half of the year. Thus, people are keeping their money together and saving where it is easiest: food. People are buying smaller, more targeted quantities and throwing less away. People's awareness of organic, environmental and health issues remains. However, due to decreasing incomes and increasing prices for many consumer goods, such as energy, some population groups have reduced their spending on organic products.

Nevertheless, buying organic remains a relevant topic; however, people are trying to get organic products cheaper. In Germany, for example, this is reflected in the continued double-digit growth rates for organic products in discounters, despite the fact that the biggest price increases were recorded there. Increasing prices for both producers and consumers is a big issue and impacts market structures. Many processing companies are struggling, and others have even gone bankrupt. Therefore, 2023 will be a challenging year for the organic sector. To reach the EU Farm to Fork target of 25 percent organic farmland in Europe by 2030, appropriate and timely support measures are needed.

Acknowledgements

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Furthermore, the data collection builds on that of the OrganicDataNetwork ("Data network for better European organic market information") project, which was funded by the European Union (EU) under its seventh framework programme for research, demonstration, and technological development (Grant agreement no 289376).

The authors would like to thank all of those who have provided data and information for this report.

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Willer, H. and Schaack, D. (2014) Final report on the compilation of key organic market data. Research Institute of Organic Agriculture (FiBL), Frick, Switzerland.

Note on data collection and countries covered

Like in the rest of the world, data collection in Europe is carried out using multiple information sources. However, we would like to point out that Eurostat, the European Union's statistical office, is constantly expanding its data collection effort in the field of organic agriculture, and most of the data on organic areas, livestock, and operators was taken from Eurostat.

This article focusses on organic farming and market statistics in Europe and includes:

- the 27 Member States of the European Union, which consist of the EU-13 countries that became members of the European Union in or after May 2004, and the EU-14 countries, who were member countries of the European Union before the accession of ten candidate countries on May 1, 2004. The United Kingdom, which left the European Union in 2020, is not included in the 2020 European Union level data.
- The EU Candidate and Potential Candidate countries (CPC): Albania, Bosnia-Herzegovina, Kosovo, North Macedonia; Montenegro, Serbia, Turkey),
- the members of the European Free Trade Association (EFTA): Iceland, Norway, Liechtenstein, Switzerland,
- Other European countries: Andorra, Belarus, Moldova, Russian Federation, San Marino, Ukraine and the United Kingdom.

Organic in Ukraine

TARAS VYSOTSKYI[1], ANDRII REMIZOV[2] AND NATALIE PROKOPCHUK[3]

Since the beginning of Russia's full-scale invasion of Ukraine on 24 February 2022, the Ukrainian organic sector, as the entire agri-food industry, has suffered from Russian aggression. In this article, the current situation of the organic sector in Ukraine is described as well as the effects of the Russian invasion.

Area and operators

The Ministry of Agrarian Policy and Food of Ukraine collected operational monitoring data as of 31 December 2021 from control bodies that certified organic production/ circulation in Ukraine according to the European Union's organic regulation and the United States National Organic Program (NOP): agricultural area (organic and in-conversion), 422'299 hectares (1 percent of total farmland) were under organic management. Of these, 370'110 hectares were fully converted. There were 528 operators; of these 418 were agricultural producers.

Most organic operators in Ukraine are certified according to the EU organic regulation; others are also certified according to the United States' National Organic Program NOP, the Canadian Organic Regime COR, the Swiss Bio Suisse, Naturland and Bioland from Germany, and KRAV (Sweden).

Export

Organic export has a major share in the Ukrainian organic market. According to the Organic Market Study of Ukraine[4], in 2021 the total Ukrainian organic export volume was about 261'000 metric tons, which corresponds to 222 million US dollars[5], 82 percent of which were exported to the EU. In 2021, organic export from Ukraine to Europe reached 189'2390 metric tons, and Ukraine ranked 5th by volume of organic agri-food products imported to the EU.[6]

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[1] Taras Vysotskyi, First Deputy Minister, Ministry of Agrarian Policy and Food of Ukraine, https://minagro.gov.ua/en/tag/organichne-virobnictvo

[2] Andrii Remizov, Director, State Institution "Entrepreneurship and Export Promotion Office", https://business.diia.gov.ua/en/eepo

[3] Natalie Prokopchuk, Organic Component Coordinator, Swiss-Ukrainian Program "Higher Value-Added Trade from the Organic and Dairy Sector in Ukraine" (QFTP), www.qftp.org

[4] The Organic Market Study Ukraine 2021 was conducted by the control body Organic Standard (Ukraine) in partnership with OrganicInfo.ua (Ukraine) with the support of Switzerland within the framework of the Swiss-Ukrainian Programs "Higher Value-Added Trade from the Organic and Dairy Sector in Ukraine" (QFTP) and "Organic Trade for Development'' (OT4D).

[5] In 2021, 1.1827 US dollars corresponded to 1 euro, according to the European Central Bank.

[6] European Commission/TRACES (2022): EU Organic Imports. https://agriculture.ec.europa.eu/system/files/2022-09/agri-market-brief-19-organic-imports_en.pdf

The largest importing countries of Ukrainian organic products (by volume) in 2021 were the Netherlands, the USA, Lithuania, Germany, Austria, Poland, Switzerland, the UK, Italy and Denmark. Ukraine also exported to some Asian countries and the United Arab Emirates. Ukraine has 18 free trade agreements with 46 countries.[1]

The top 10 organic products exported from Ukraine in 2021 were corn, soybean, wheat (including spelt), sunflower cake, rapeseed, sunflower oil, frozen blueberries, sunflower seeds, millet, frozen elderberries. More organic products with a higher added value appeared in Ukraine's export portfolio over the last years, such as organic oil (sunflower and others), various frozen, dried and fresh berries and fruits, tomato paste, sugar and others.

Despite the full-scale war, according to the analysis of Organic Standard based on TRACES, during 2022 Ukraine exported 225'814 metric tons of organic products to the EU and Switzerland, a 13 percent increase compared to 2021 (200'239 metric tons). The volume of organic exports increased for railway and road vehicles, but decreased for vessels.

The state institution "Entrepreneurship and Export Promotion Office" plays a leading role in organic export facilitation and capacity development for Ukrainian organic exporters.

Domestic market

According to the Organic Market Study of Ukraine 2021, domestic sales of Ukrainian organic products reached 9'780 metric tons (about 33 million US dollars) in 2021, which shows an 11 percent increase in volume and 27 percent increase in value compared to the previous year (8'778 metric tons or 26 million US dollars in 2020).

Organic products on the Ukrainian domestic market include dairy products, vegetables, fruits, and mushrooms; cereals, groats, flour, and seeds; juices, drinks, puree, canned products; eggs; meat products; oils in assortment; herbs and spices, sugar; bakery products; dumplings, honey, tea, etc. The largest sales channels for organic products are supermarkets in the big cities of Ukraine.

Stakeholders

There are active organic stakeholders in Ukraine: Organic Initiative (stakeholder platform), Organic Standard (certification body), Organic Ukraine (NGO), Organic Federation of Ukraine, Information centre "Green Dossier", Organic Business School, Ecoterra NGO, Ukrainian Berries Association and others.

International support

Ukraine has been receiving international support for organic market development through the technical assistance projects financed by Switzerland (SECO), Germany (BMEL), the EU and USA (USAID).

[1] https://ukraine.ua/invest-trade/trade-with-ukraine/

Policy

The Law of Ukraine on organic[1] has been applied since 2 August 2019. All corresponding bylaws were approved.

On 3 March 2021, the Ukrainian government approved the National Economic Strategy with two organic indicators:

– The organic area should increase to up to three percent of the total agricultural land, and
– organic exports should increase up to one billion US dollars by 2030.

Ukraine set "organic agriculture development" as an indicator to show Ukraine's progress towards achieving the Sustainable Development Goals (SDGs).

Following the path of European integration, Ukraine celebrated and launched 23 September as the Organic Day in Ukraine[2], the same day as in the EU. Ukraine is on the European Organic Map.[3]

Organic remains one of the priorities for the development of the agri-food sector at the state level aiming at full implementation of the Ukrainian organic legislation and its adaptation with the new EU organic regulation.

The organic sector during the war

Since the beginning of Russia's full-scale invasion of Ukraine on 24 February 2022, the Ukrainian organic sector, as the entire agri-food industry, has been suffering from the Russian aggression. According to a survey[4] conducted by the Organic Initiative and the NGO Organic Ukraine, the most significant negative impact on the production processes include the overall safety situation (74 percent), access to financial resources (72 percent), destroyed infrastructure (65 percent), lack of fuel and lubricants (79 percent).

Many organic operators have experienced direct losses because of occupation and direct hits, seaports blockade, destruction of infrastructure facilities and supply chains, and a significant increase in prices of inputs, fuel and logistics. The main problems of the domestic organic market are the disrupted supply chains, migration of many

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[1]

› Ukrainian organic legislation at the Ukrainian Parliament's website: https://zakon.rada.gov.ua/laws/show/2496-19?lang=en#Text
› Scheme of Ukrainian organic legislation (EN): https://organicinfo.ua/wp-content/uploads/2022/05/Scheme_Organic-Law-UA_31_05_2022_EN.pdf
› Ukrainian organic legislation overview (list of by-laws): https://organicinfo.ua/UA_By-laws_list_UA_EN.pdf

[2] Website of the Ministry of Agrarian Policy and Food of Ukraine: Ukraine and EU together celebrate the Organic Day; available at https://minagro.gov.ua/en/news/ukraine-and-eu-together-celebrate-organic-day

[3] Website of IFOAM Organics Europe :European Organic Day; available at https://www.organicseurope.bio/get-involved/european-organic-day/

[4] OrganicInfo website: Situation in the Ukrainian organic sector after 5 months of Russia's full-fledged invasion; available at https://organicinfo.ua/en/news/statement-july2022/

organic consumers to other regions and abroad, decreased purchasing power and, therefore, reduced demand for organic.

Massive hits on energy infrastructure facilities caused power cuts and emergency blackouts in the majority of regions in Ukraine. Lack of light, water, heating, internet and mobile connection have become a part of the new life and work conditions for Ukrainians.

Most of the Oblast state administrations in Ukraine, used to support organic producers in their regions. However, due to martial law in the country, regional support for organic producers was suspended. The organic digital communication campaign, which was launched by the Organic Initiative, targeting consumers in 2021, was postponed, as well as the introduction of organic products into public procurement for schools and kindergartens in Ukraine due to the full-scale war.

Despite the difficult situation, the Ukrainian organic sector and policymakers continue to work hard for recovery and further organic market development. It is very important to support them.[1]

More information

More about organic in Ukraine: www.organicinfo.ua

[1] Grant Program "Support of organic sector in Ukraine «of the Organic Initiative: https://organicinitiative.org.ua/en/special-project/organic-sector-support/

Table 73: Europe: Organic agricultural land by country 2021

Please note that not for all countries 2021 data were available.

Country	Organic agr. land [ha]	Organic share [%]	Change 2020-2021 [%]	Change 2012-2021 [%]	Change 2020-2021 [ha]
Albania	1'094	0.1%	23.4%	95.3%	207
Andorra	2	0.0%	5.5%		0
Austria	679'119	26.5%	-0.1%	20.9%	-753
Belarus	6'725	0.1%	-1.6%		-113
Belgium	101'828	7.4%	2.8%	70.5%	2'753
Bosnia & Herzegovina	2'495	0.1%	47.5%	627.8%	803
Bulgaria	86'310	1.7%	-25.8%	120.5%	-29'943
Channel Islands	180	2.0%		-30.8%	
Croatia	121'924	8.1%	12.3%	282.2%	13'314
Cyprus	7'738	5.7%	30.8%	97.2%	1'820
Czech Republic	558'124	15.8%	3.4%	19.1%	18'592
Denmark	299'998	11.4%	0.0%	71.3%	0
Estonia	226'605	23.0%	2.6%	57.2%	5'809
Faroe Islands	251	8.4%	0.0%	-0.8%	0
Finland	327'736	14.4%	4.0%	65.7%	12'624
France	2'776'554	9.6%	8.9%	168.8%	227'877
Germany	1'802'231	10.8%	5.9%	74.2%	99'991
Greece	534'629	10.1%		15.6%	
Hungary	293'597	5.9%	-2.6%	124.8%	-7'833
Iceland	6'440	0.4%	36.7%	-21.8%	1'731
Ireland	86'868	1.9%	16.3%	64.5%	12'202
Italy	2'186'159	16.7%	4.3%	87.3%	90'795
Kosovo	1'990	0.5%	24.1%	1692.8%	386
Latvia	291'150	14.8%	0.0%	48.8%	0
Liechtenstein	1'423	40.2%	-4.5%	31.0%	-67
Lithuania	261'782	8.9%	11.2%	67.2%	26'311
Luxembourg	6'893	5.2%	12.7%	66.9%	775
Malta	66	0.6%	-2.1%	77.2%	-1
Moldova	28'368	1.3%	2.7%	28.4%	744
Montenegro	4'404	1.7%	-8.7%	43.5%	-419
Netherlands	76'375	4.2%	6.7%	59.0%	4'768
North Macedonia	7'794	0.6%	109.1%	-38.8%	4'067
Norway	45'112	4.6%	-0.2%	-18.4%	-69
Poland	509'286	3.5%		-23.1%	
Portugal	308'289	7.8%	-3.5%	54.0%	-11'251
Romania	578'718	4.3%	23.4%	100.8%	109'831
Russian Federation	655'457	0.3%	6.5%	348.2%	40'269
Serbia	23'527	0.7%	21.8%	271.1%	4'210
Slovakia	222'896	11.7%		33.7%	
Slovenia	52'078	10.8%		48.4%	
Spain	2'635'442	10.8%	8.1%	65.4%	197'551
Sweden	606'669	20.2%	-0.6%	27.0%	-3'874
Switzerland	181'444	17.4%	2.3%	49.0%	4'098
Türkiye	327'583	0.9%	-14.4%	-37.4%	-55'056
Ukraine	422'299	1.0%	-8.6%	54.8%	-39'926
United Kingdom	489'200	2.8%	3.3%	-17.1%	15'700
Total Europe	**14'868'780**	**9.2%**	**5.3%**	**68.3%**	**748'149**
Total EU	**15'639'063**	**9.6%**	**5.2%**	**66.5%**	**771'358**

Source: *FiBL-AMI survey 2023 based on Eurostat and national data sources. For data sources, see annex*

Table 74: Europe: Conversion status of organic agricultural land 2021

Please note that not for all countries and for all indicators 2021 data were available.

County	Organic area [ha]	Area fully converted [ha]	Area under conversion [ha]
Albania	1'094	912	183
Andorra	2	2	
Austria	679'119		
Belarus	6'725	2'443	4'282
Belgium	101'830	85'527	13'547
Bosnia and Herzegovina	2'495	2'082	413
Bulgaria	86'310	70'424	15'887
Channel Islands	180	180	
Croatia	121'924	89'770	32'154
Cyprus	7'738	5'420	2'318
Czech Republic	558'124	522'619	35'504
Denmark	299'998	243'674	56'328
Estonia	226'605	209'472	17'132
Faroe Islands	251	251	
Finland	327'737	290'192	37'643
France	2'776'554	2'192'182	584'617
Germany	1'802'231		
Greece	534'629	451'079	83'554
Hungary	293'597	262'906	30'691
Iceland	6'440	4'502	1'938
Ireland	86'868	70'360	16'507
Isle of Man			
Italy	2'186'159	1'784'480	401'679
Kosovo	1'990	1'987	3
Latvia	291'150	264'860	26'291
Liechtenstein	1'423	1'423	
Lithuania	261'782	208'266	53'516
Luxembourg	6'893	5'670	1'223
Malta	66	44	21
Moldova	28'368	22'242	6'124
Montenegro	4'404	4'160	244
Netherlands	76'375	71'281	5'093
North Macedonia	7'794	5'912	1'882
Norway	45'112	42'017	3'095
Poland	509'286	400'855	108'442
Portugal	308'289	257'121	51'168
Romania	578'718	344'541	234'177
Russian Federation	655'457	94'489	7'404
San Marino			
Serbia	23'528	13'225	10'303
Slovakia	222'896	181'740	41'153
Slovenia	52'078	45'788	6'292
Spain	2'635'442	1'956'836	218'732
Sweden	606'669	570'207	36'462
Switzerland	181'444		
Türkiye	327'583	219'445	108'138
Ukraine	422'299	370'110	52'189
United Kingdom	489'200	448'600	40'600
Europe	**17'844'856**	**11'819'294**	**2'346'930**
European Union	**15'639'066**	**10'585'313**	**2'110'132**

Source: *FiBL-AMI survey 2023 based on Eurostat and national data sources. For data sources, see annex.*

Table 75: Europe: Land use in organic agriculture by country 2021

Please note that not for all countries 2021 data were available.

Country	Arable land [ha]	Permanent grassland [ha]	Permanent crops [ha]	Total [ha]
Albania	759		128	887
Andorra			2	2
Austria	275'403	392'168	12'301	679'872
Belarus	1'298		66	6'838
Belgium	35'922	61'644	1'507	99'073
Bosnia and Herzegovina	1'532		159	1'692
Bulgaria	61'249	30'154	24'849	116'252
Channel Islands				180
Croatia	50'203	42'332	16'077	108'610
Cyprus	2'916	186	2'816	5'918
Czech Republic	91'436	442'399	5'696	539'532
Denmark	248'473	47'949	3'576	299'998
Estonia	124'378	93'896	2'522	220'796
Faroe Islands	1	250		251
Finland	266'668		625	315'112
France	1'445'221	879'244	193'731	2'548'677
Germany	735'727	880'000	25'132	1'702'240
Greece	172'441	294'012	68'176	534'629
Hungary	105'562	180'961	14'907	301'430
Iceland	543	2'356	1	4'709
Ireland	8'103	66'488	75	74'666
Isle of Man				
Italy	1'016'287	583'781	495'296	2'095'364
Kosovo	1'593		11	1'604
Latvia	155'204	132'635	3'311	291'150
Liechtenstein	228	1'144	7	1'490
Lithuania	142'344	82'143	4'753	235'471
Luxembourg	2'858	3'130	130	6'118
Malta	41		26	67
Moldova	23'223		4'305	27'624
Montenegro	307	3'952	564	4'823
Netherlands	29'165	41'541	901	71'607
North Macedonia	2'955		772	3'727
Norway	36'337	8'501	343	45'181
Poland	375'930	85'741	47'615	509'286
Portugal	57'381	196'502	65'657	319'540
Romania	291'628	155'038	22'221	468'887
Russian Federation	585'148	2'489		615'067
Serbia	10'200	3'517	5'600	19'317
Slovakia	75'589	145'209	2'095	222'896
Slovenia	6'893	41'903	3'280	52'078
Spain	502'074	1'273'392	662'425	2'437'891
Sweden	471'460	138'398	686	610'544
Switzerland	42'951	128'550	3'107	177'347
Türkiye	165'058	12'545	205'036	382'639
Ukraine	345'375	1'375	3'855	462'225
United Kingdom	159'000	304'500	2'000	473'500
Total Europe	**8'127'064**	**6'760'026**	**1'906'341**	**17'096'807**
Total EU	**6'750'556**	**6'290'847**	**1'680'385**	**14'867'704**

Source: FiBL-AMI survey 2023 based on Eurostat and national data sources. For data sources, see annex. The total includes other agricultural areas for which no land use details were available.

Table 76: Europe: Organic agricultural land and wild collection areas by country 2021

Please note that not for all countries 2021 data were available.

Country	Agricultural land [ha]	Wild collection [ha]	Total [ha]
Albania	1'094	475'136	476'230
Andorra	2		2
Austria	679'119		679'119
Belarus	6'725		6'725
Belgium	101'830		101'830
Bosnia and Herzegovina	2'495	195'668	198'163
Bulgaria	86'310		86'310
Channel Islands	180		180
Croatia	121'924		121'924
Cyprus	7'738		7'738
Czech Republic	558'124		558'124
Denmark	299'998		299'998
Estonia	226'605	445'512	672'117
Faroe Islands	251		251
Finland	327'737	6'928'693	7'256'430
France	2'776'554		2'776'554
Germany	1'802'231		1'802'231
Greece	534'629		534'629
Hungary	293'597		293'597
Iceland	6'440	454'382	460'822
Ireland	86'868		86'868
Isle of Man			
Italy	2'186'159		2'186'159
Kosovo	1'990	373'488	375'478
Latvia	291'150		291'150
Liechtenstein	1'423		1'423
Lithuania	261'782		261'782
Luxembourg	6'893		6'893
Malta	66		66
Moldova	28'368	1'351	29'719
Montenegro	4'404		4'404
Netherlands	76'375		76'375
North Macedonia	7'794	556'600	564'394
Norway	45'112		45'112
Poland	509'286		509'286
Portugal	308'289		308'289
Romania	578'718		578'718
Russian Federation	655'457	801'704	1'457'162
Serbia	23'528		23'528
Slovakia	222'896		222'896
Slovenia	52'078		52'078
Spain	2'635'442		2'635'442
Sweden	606'669		606'669
Switzerland	181'444		181'444
Türkiye	327'583	24'334	351'917
Ukraine	422'299	328'596	750'895
United Kingdom	489'200		489'200
Europe	**17'844'856**	**10'585'464**	**28'430'320**
European Union	**15'639'066**	**7'374'205**	**23'013'271**

Source: FiBL-AMI survey 2023 based on Eurostat and national data sources. For data sources, see annex.

Table 77: Europe: Organic producers, processors, and importers by country 2021

Please note that not for all countries 2021 data were available.

Country	Producers	Processors	Importers	Exporters
Albania	130	62		26
Andorra		3		
Austria	23'961	1'691	58	4
Belarus	19	20		11
Belgium	2'590	1'585	304	153
Bosnia and Herzegovina	90	51		20
Bulgaria	5'942	249	22	2
Croatia	6'024	378	12	
Cyprus	1'292	70	28	0
Czech Republic	4'797	930	359	163
Denmark	4'186	1'162	101	104
Estonia	2'043	195	47	24
Faroe Islands	1	1		
Finland	5'007	414	56	37
France	58'413	19'311	662	
Germany	36'307	19'572	2'016	
Greece	29'869	1'653	45	40
Hungary	5'129	489	61	0
Iceland	30	20	8	3
Ireland	1'914	215	156	58
Italy	75'874	23'802	579	1'036
Kosovo	56	19		
Latvia	4'171	65	5	0
Liechtenstein	47			
Lithuania	2'529	121	1	
Luxembourg	123	107	8	0
Malta	25	16	54	0
Moldova	151	21	3	40
Monaco		2		
Montenegro	422	25		0
Netherlands	1'985	995	533	146
North Macedonia	887	17	8	1
Norway	1'778	471	103	0
Poland	18'598	668	267	319
Portugal	13'263	1'296	66	31
Romania	11'562	209	34	25
Russian Federation	66	19		
Serbia	458	152	74	82
Slovakia	716	119	43	5
Slovenia	3'685	139	28	0
Spain	52'861	5'921	472	230
Sweden	5'360	1'128	361	27
Switzerland	7'670	1'427	520	15
Türkiye	48'244	227	280	516
Ukraine	418	73		
United Kingdom	3'581	2'566	216	
Europe	**442'274**	**87'676**	**7'590**	**3'118**
European Union	**378'226**	**82'500**	**6'378**	**2'404**

Source: FiBL-AMI survey 2023 based on Eurostat and national data sources. For data sources, see annex.
**Total number includes data for countries with less than three operators.*

Table 78: Europe and European Union: Organic retail sales 2021*

Country	Data year**	Retail sales [Million €]	€/person [€]	Organic share [%]	1 year growth [%]	Food-service [Million €]
Austria	2021	2'397.0	268.3	11.6	5.8	128.0
Belgium	2021	978.2	121.5	3.8	4.6	
Bosnia and Herzegovina	2017	0.4	0.1			
Bulgaria	2021	33.0	4.8	1.0	2.5	
Croatia	2018	99.3	24.2	2.2		
Czech Republic	2020	226.0	21.9	1.8		7.6
Denmark	2021	2'240.0	383.6	13.0	0.0	284.0
Estonia	2017					9.9
	2021	92.6	69.6	5.0	21.0	
Finland	2021	407.0	73.5	2.5	-0.5	
France	2021	12'659.0	187.1	6.6	-0.3	609.0
Germany	2021	15'870.0	190.8	7.0	5.8	
Greece	2021	66.0	6.2	0.3		
Hungary	2015	30.0	3.0	0.3		
Ireland	2020	235.0	47.3	2.7		
	2021				2.7	
Italy	2021	3'943.0	66.6	3.4	-0.8	1'074.0
Latvia	2017	51.0	6.3	1.5		
Liechtenstein	2021	8.8	229.8			
Lithuania	2017	50.5	17.8	1.0		5.0
Luxembourg	2021	197.1	313.0	11.0	15.3	6.0
Netherlands	2019					330.3
	2021	1'374.0	78.6	3.3	0.9	
Norway	2016			1.7		
	2019	441.8	82.9			29.9
Poland	2021	314.1	8.3	0.6		
Portugal	2011	21.0	2.0	0.2		
Romania	2016	40.7	2.1	0.2		
Russian Federation	2018	183.0	1.3			
Slovenia	2009					0.1
	2013	48.6	26.6	1.8		
Spain	2019					54.4
	2020	2'528.0	53.4	2.5		
Sweden	2021	2'764.0	266.3	8.9	-5.4	607.0
Switzerland	2021	3'704.6	424.6	10.9	3.9	
Türkiye	2014	46.2	0.6			
Ukraine	2021	27.9	0.6			
United Kingdom	2020			1.8		
	2021	3'461.3	51.6		5.2	91.0
Europe		**54'539.0**	**65.7**		**+3.8%**	
European Union		**46'665.0**	**104.3**	**4.7%**	**+3.6%**	

Source: FiBL-AMI survey 2023 based on national data sources. For details on data sources, see annex.

*Note on the table:
› Where no published data exists, best estimates from experts were used.
› New data were not available for all countries. Therefore, in some cases, earlier data are shown.
› Values published in national currencies were converted to euros using the 2021 average annual exchange rates according to the Central European Bank. Please note that due to fluctuating exchange rates, it is not possible to make a year-to-year comparison for countries that do not have the Euro as their currency.

** «Data year» refers to the year from which the data are. As stated above, not all countries provided up-to-date data.

Table 79: Europe: International Trade 2021

Country	EU imports [MT]*	Exports to EU and USA combined [MT]**	Exports [Million €]***	Imports [Million €]***
Albania		1'969.9		
Austria	35'345.1	415.3		
Belarus		2'459.1		
Belgium	276'832.7			
Bosnia and Herzegovina		2'788.1	6.3	
Bulgaria	18'870.1	15.5		
Croatia	964.3	27.2	2.9	34.8
Cyprus	225.7			
Czech Republic	30'066.9		133.8	115.7
Denmark	61'737.5	0.1	439.3	678.8
Estonia	292.4	5'182.0	27.0	
Finland	16'036.7		27.5	
France	271'608.3	1'873.6	887.0	2'830.0
Germany	517'182.7	244.7		
Greece	13'061.1	1'846.1		
Hungary	1'168.7		20.0	18.0
Ireland	83'517.1	15.8		
Italy	224'956.4	27'450.0	2'900.0	
Kosovo		560.6	6.0	
Latvia	414.6		51.0	
Lithuania	34'800.4	2.5	45.0	
Luxembourg	44.4			
Malta	51.4			
Moldova		19'376.4		
Montenegro		16.5		
Netherlands	945'125.0	668.6	1'200.0	
North Macedonia		662.1		
Poland	37'382.3	1.6		
Portugal	6'810.3	3'227.6		
Romania	9'939.1	9.0	200.0	35.0
Russian Federation		61'865.0		
Serbia		19'467.8	18.9	3.7
Slovakia	407.4			
Slovenia	9'356.8		0.1	23.0
Spain	93'337.6	10'081.9	1'165.0	1'014.0
Sweden	183'413.0	44.7	117.0	
Switzerland		32.3		
Türkiye		170'755.4		
Ukraine		239'567.9	187.7	4.0
United Kingdom		108'307.0	193.9	
Europe	***2'872'947.7***	***679'010.3***	***7'628.3***	***4'756.9***
European Union	***2'872'947.7***	***51'182.3***	***7'215.5***	***4'749.2***

Source: European Commission/TRACES, USDA/GATS, FiBL survey based on national data sources

› *Imports in metric tons (MT) to the European Union based on Traces/European Commission data
› ** Exports to the European Union (from European non-EU countries only, based on TRACES/European Commission) and to the US (based on GATS/USDA; all European countries). Please note that the US import data do not cover all products.
› *** Export and import values (to and from ALL countries) are based on national data sources.

Table 80: European Union: EU organic imports by EU Member State 2021 (EU 27)

Country	2018 [MT]	2019 [MT]	2020 [MT]	2021 [MT]
Country	2018	2019	2020	2021
Austria	35'920.9	28'379.1	30'766.2	35'345.1
Belgium	177'959.5	371'911.6	303'002.3	276'832.7
Bulgaria	12'280.6	14'847.1	15'330.7	18'870.1
Croatia	3'559.3	1'059.0	540.4	964.3
Cyprus	211.2	251.6	139.9	225.7
Czech Republic	29'492.6	19'956.0	25'020.6	30'066.9
Denmark	127'413.1	120'704.8	82'116.4	61'737.5
Estonia	474.8	326.1	313.0	292.4
European Union undefined	197'612.1			
Finland	14'987.7	18'921.3	18'421.1	16'036.7
France	213'625.3	240'582.4	274'620.0	271'608.3
Germany	427'615.9	432'897.1	491'718.5	517'182.7
Greece	6'368.0	8'269.8	10'180.1	13'061.1
Hungary	2'061.7	991.8	991.5	1'168.7
Ireland	19'476.4	4'099.4	61'778.5	83'517.1
Italy	185'803.0	180'388.1	236'106.3	224'956.4
Latvia	52.4	3'359.4	520.0	414.6
Lithuania	2'797.5	8'346.2	33'144.3	34'800.4
Luxembourg	487.8	47.2	65.1	44.4
Malta	1.0	8.8	60.0	51.4
Netherlands	953'037.8	1'037'553.5	857'360.6	945'125.0
Poland	19'330.4	29'285.3	36'077.2	37'382.3
Portugal	7'238.9	4'305.1	7'070.4	6'810.3
Romania	8'816.7	9'025.7	10'888.7	9'939.1
Slovakia	455.0	617.0	251.6	407.4
Slovenia	17'460.9	22'418.9	6'458.3	9'356.8
Spain	78'818.2	100'140.1	112'183.6	93'337.6
Sweden	167'269.1	190'023.2	178'977.7	183'413.0
Total	**2'710'628.0**	**2'848'715.5**	**2'794'103.1**	**2'872'947.7**

Source: TRACES/European Commission

Latin America and the Caribbean



Map 5: Organic agricultural land in the countries of Latin America and the Caribbean 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Organic Agriculture in Latin America

GABRIELA SOTO[1] AND ROBERTO UGÁS[2]

Production and markets

Organic production in Latin America grew slowly despite the challenges faced in the 2022; recovering from the economic downturn caused by the coronavirus pandemic, food inflation and getting back on track with economic growth and poverty reduction

Country highlights

Peru, one of the top organic exporters with Brazil and Mexico, crossed the line of half a million certified organic hectares and over 110'000 organic farmers. For some crops, both local and foreign demand grew as many consumers became more concerned about the quality of their food and the need to avoid chemical contaminants. In the last 20 years, Peru has become a key producer and exporter of fruits and vegetables, mainly in irrigated fields in the coastal desert, where medium and large firms control farming operations. The increasing interest in organic products can be seen in specialised websites and technical journals that inform about more private companies starting to grow organically or existing organic operations that increase their production of crops such as table grapes, avocados, blueberries and mango. This is a new development, as organic agriculture for export used to be dominated by smallholders growing coffee, cocoa, quinoa, banana or ginger.

Argentina showed a significant increase in the exports of grape juice and raisins in 2022 but a considerable decrease in the livestock production area in the province of Santa Cruz due mainly to the drought.

In **Chile**, the sales of organic wines increased by more than 20 percent in 2021 for the founding wineries of the Chilean Organic Winegrowers (COW), a group created in 2022 with a focus on developing research into organic viticulture and wine production and promoting Chilean organic wines, raising awareness for greater sustainability in the vineyard and winery.

Commodity highlights

The worldwide boom in the production and consumption of **blueberries** has seen Peru, Chile and Mexico positioned among the top five exporters. In Chile, organic blueberries constitute 17 percent of the total acreage for this crop, and blueberries are the country's top organic export product.

Exports of organic **asparagus** from Peru may increase as plant protection authorities from Peru and the US discuss a possible lifting of the obligation for all asparagus to be fumigated at any US point of entry.

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[2] Roberto Ugas, Universidad Nacional Agraria La Molina, Lima, Peru

Something to watch are small new developments in producing and exporting organic **pineapple** in Costa Rica, the world's leading pineapple exporter.

Input substitution versus system redesign?

Increased exports of organic fruits and vegetables, very often in the hands of medium and large-size operations, is excellent news. A common criticism of the organic or agroecological movements is, however, that organic operations often seem to be based solely on an input substitution approach without moving into system redesign and greater sustainability.

Environmental conservation should be looked at more carefully by certification agencies. For example, in intensive organic production of crops, such as such as ginger in the Andean Amazon of central Peru or coffee and cacao throughout tropical Latin America, more attention needs to be paid to the landscape quality. In this regard, previous experiences where intensified organic crop production led to environmental degradation or weakening of farmers' organisations (quinoa in Bolivia and Peru, for instance) should be studied, and lessons learned.

Local markets

Local markets for certified organic products are still very small, despite the steady increase of the urban population and middle classes throughout the continent; poverty, however, increased during the pandemic. According to the Organic Trade Association, the market for organic packaged food in Brazil reached 81 million US dollars in 2021, representing 0.1 percent of the global market value with an annual per capita consumption of 0.38 US dollars.[1]

No figures are available for other countries, but some market trends can be pointed out. Consumer interest in safer and better food has increased. Consumers are interested in boosting the immune system and avoiding disease; this has been an important incentive for more organic products (certified, but mainly non-certified) to reach major cities. These developments are very often linked to the agroecological movement and, in some countries, to participatory guarantee systems.

The pandemic has prompted an increase in the number and frequency of farmers' markets in open spaces. Many types of *ferias* (the word in Spanish and Portuguese for these markets) sprouted up throughout the continent. An important and sometimes daunting challenge is negotiating public spaces with changing authorities, who are often against *ferias* in plazas or parks.

Currently several Latin American countries have national logos to identify organic products in their national marketplaces but very often operators just use the EU or US logo in their labels; Brazil and Mexico are the countries where it is easier to find the national logo in the retail sector.

[1] For more information see website of the Organic Trade Association (OTA) at https://globalorganictrade.com/country/brazil.

Latin America and the Caribbean

Movements

The interest in agroecology continues to grow in the region. The 9th Latin American Congress in Agroecology, organised by the Latin American Scientific Society of Agroecology (SOCLA in Spanish), was celebrated in Costa Rica in 2022 with over 500 participants from Latin America and Spain.

Several countries in the region have created policies to promote agroecology, such as Uruguay, where the respective regulation was approved in 2021, or Colombia, where a proposal was presented to Congress in 2022. Mexico City established an Agroecological Certification Standard in 2019 for the national market. In Colombia, the technical education as an agroecologist was formally approved, the first such recognition in the region.

In collaboration with IFOAM - Organics International. A participatory guarantee system designed explicitly for mountain agriculture (Mountain PGS) was launched in seven countries of Asia and Latin America by the Mountain Partnership.

The organic and agroecological movements in the region may have similar or different visions, but they very often work together closely, mainly promoting local markets for organic products. Still, they may differ in approaches to research, advocacy and the central role of smallholders. In recent years many organisations are showing a broader perspective of rural development, moving from individual farms or specific farmers' organisations to an analysis of landscapes and territories, with more opportunities for synergies and political action in favour of agroecology and organic agriculture.

Organic regulations and programs

The application of the new European Union organic legislation in 2022 kept certification bodies and competent authorities extra busy, and the impact on producers in Latin America that must comply with this set of rules should be assessed in the near future. Costa Rica, Colombia and Peru are among the countries that are currently reviewing their organic standards.

Argentina approved an Organic Argentina 2030 Strategic Plan, and in Colombia, a study on the impacts of the organic regulation was commissioned, connected to their 2030 Agroecology Plan. Peru also approved its 2030 Plan for the Promotion of Organic or Ecological Production. However, as in other countries, it is unclear if governments will fulfil their commitments to fund these plans fully.

Peru finalised and approved a national logo for organic products and their regulation on participatory guarantee systems (the first authorisations were issued, but the movement continues to criticise the regulation as it considers it too similar to a third-party certification).

Mexico has been negotiating a new organic agreement with Canada. The Inter-American Commission for Organic Agriculture (CIAO), a technical entity of the Ministers of Agriculture of the Americas, supports competent authorities throughout the continent and provides technical assistance.

Latin America and the Caribbean: Key Facts and Figures

JAN TRÁVNÍČEK[1], BERNHARD SCHLATTER[2] AND HELGA WILLER[3]

Nearly 9.9 million hectares of farmland in Latin America and the Caribbean were organic in 2021 – Argentina had the largest area

In Latin America and the Caribbean, nearly 9.9 million hectares were managed organically in 2021. Almost 13 percent of the world's organic farmland was in Latin America and the Caribbean.

With almost 4'075'000 hectares, Argentina had the largest farmland area under organic management, followed by Uruguay (almost 2'742'000 hectares), Brazil (over 1'482'000 hectares) and Peru (almost 375'000 hectares). Almost 88 percent of Latin America and the Caribbean's organic farmland was in these four countries.

Uruguay is the country with the highest organic area share in Latin America and the Caribbean

Organic farmland in Latin America and the Caribbean constituted 1.4 percent of the total agricultural land of the continent and was thus below the global organic area share of 1.6 percent in 2021.

The country with the highest organic area share was Uruguay, with a share of 19.6 percent, followed by French Guyana (11.9 percent) and Dominica (11.6 percent).

In Latin America and the Caribbean, organic farmland decreased by more than 67'000 hectares

Organic land decreased by more than 67'000 hectares (-0.7 percent) in Latin America and the Caribbean, mainly due to a major decrease of organic farmland in Argentina in 2021. In the decade 2012 to 2021, organic farmland grew by 30 percent and thus at a much slower rate than global organic farmland.

Key crops grown are coffee, cocoa and cereals

Only 5.3 percent of organic farmland in Latin America and the Caribbean is used for arable crops (527'258 hectares). Among the key crops were cereals (161'447 hectares, mainly in Bolivia and Peru), sugarcane (93'953 hectares, mainly in Paraguay, Argentina and Brazil) and oilseeds (73'619 hectares, mainly in Bolivia and Mexico).

Permanent crops accounted for approximately 9.5 percent of total organic land in Latin America and the Caribbean in 2021. Among the key crops were coffee (466'922 hectares), mainly in Peru, Mexico and Colombia; cocoa (179'689 hectares), mainly in

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Peru and the Dominican Republic; and tropical and subtropical fruit (120'773 hectares), mainly in the Dominican Republic, Ecuador, Peru and Mexico.

Almost 70 percent of Latin America and Caribbean organic farmland is permanent grassland (6'894'732), and it is located mainly in Argentina, Uruguay and Brazil. These three countries represent 97.4 percent of the total organic grassland/grazing areas in Latin America and the Caribbean.

Organic producers, processors and importers: Increase of producers by more than 18'000 in 2021

There were more than 280'436 organic producers in Latin America and the Caribbean, with the highest number in Peru (117'398). Eight percent of the world's organic producers were in Latin America and the Caribbean. Compared to 2020, there were 18'321 more (7 percent up) organic producers, a total of 1'161 exporters and 9'415 processors.

Retail sales: Data almost non-existent in Latin America and in the Caribbean

Organic retail sales data for Latin America and the Caribbean are almost non-existent. However, this does not mean that there is no domestic market for organic products in Latin America. Many countries have developed local markets.

Almost 60 percent of the EU and US imports are from Latin America and the Caribbean

Data on organic export volumes in metric tons to the European Union, which is a major market for Latin America and the Caribbean, has been available since 2018. Export data to the US has been available for even longer (since 2014); however, US organic imports data do not cover all products.

Data show that in 2021, over 2.7 million metric tons of products were exported from Latin America and the Caribbean to the EU and US, constituting 56.8 percent of all organic exports to these countries/trade blocks. In the 4-year period between 2018 and 2021, Latin America in Caribbean exports increased by almost 21.4 percent, considerably faster than global organic exports to the EU and US, which grew by only 5 percent in the same period.

Ecuador is the largest exporter

The largest Latin American and Caribbean exporter was Ecuador (more than 583'589 metric tons of products, 94 percent being bananas), followed by Mexico (over 425'000 metric tons, mainly bananas and avocados) and Peru (344'483 metric tons, mainly bananas).

Bananas are the most important export product

With more than 1'231'689 metric tons and almost 46 percent of the Latin American and Caribbean organic exports, bananas are the most important product group, followed by sugar (360'077 metric tons) and coffee (187'355 metric tons).

For more information about the Latin American and the Caribbean figures, see figures and data tables for the region, following pages.

Organic Agriculture in Latin America and the Caribbean: Graphs

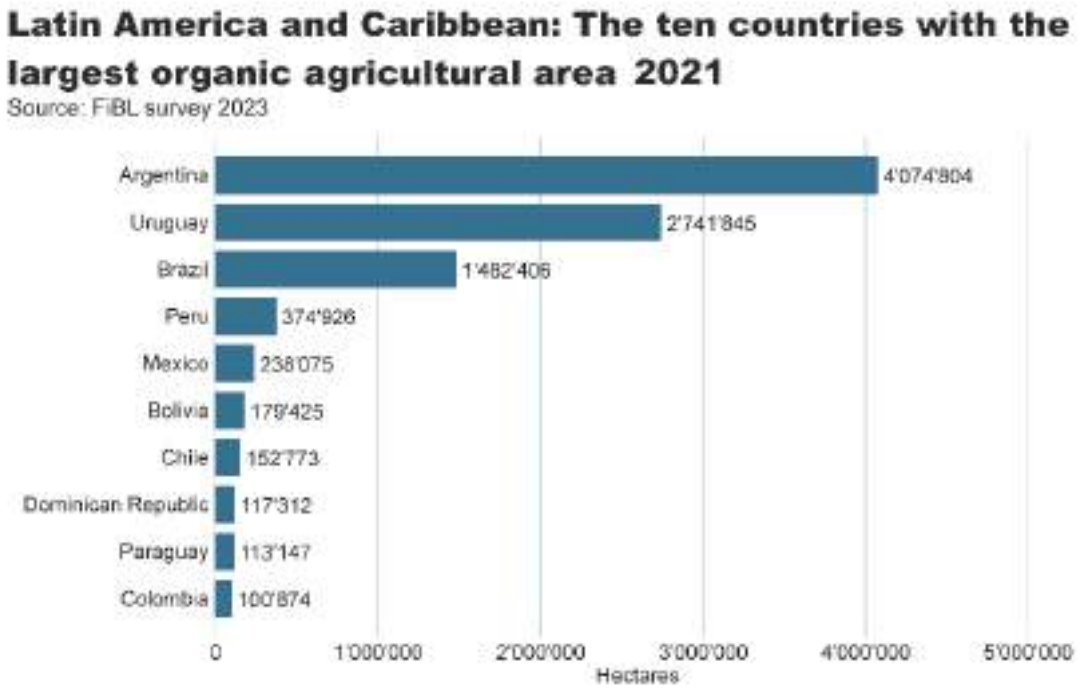


Figure 95: Latin America and the Caribbean: The ten countries with the largest organic agricultural area 2021

Source: CIAO-FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page

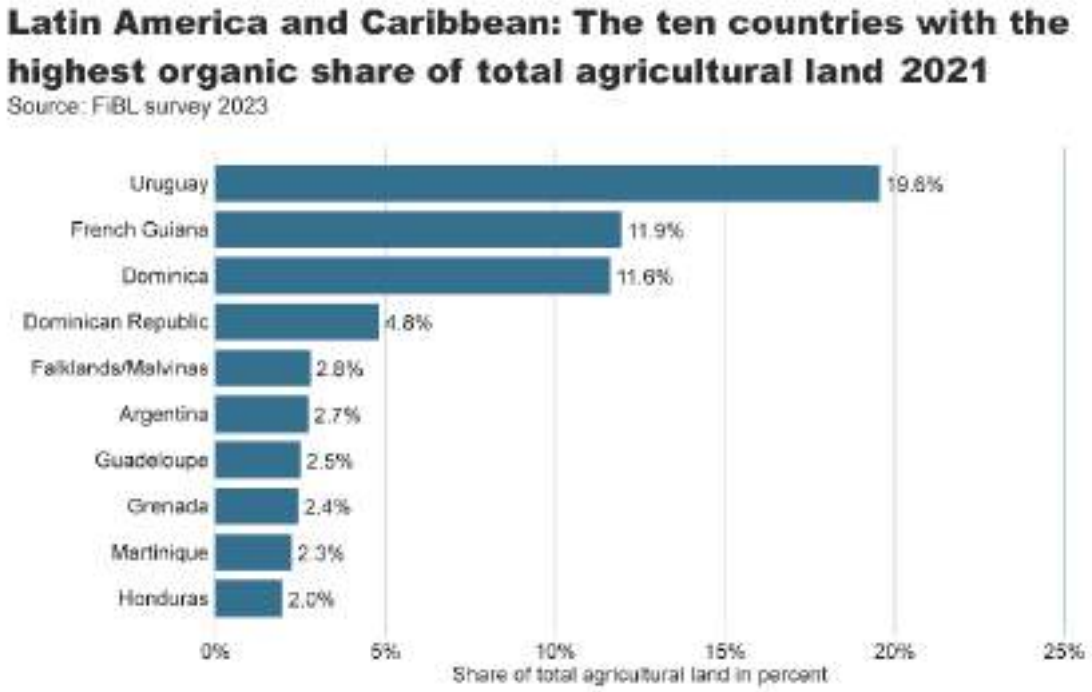


Figure 96: Latin America and the Caribbean: Highest organic area shares 2021

Source: CIAO-FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

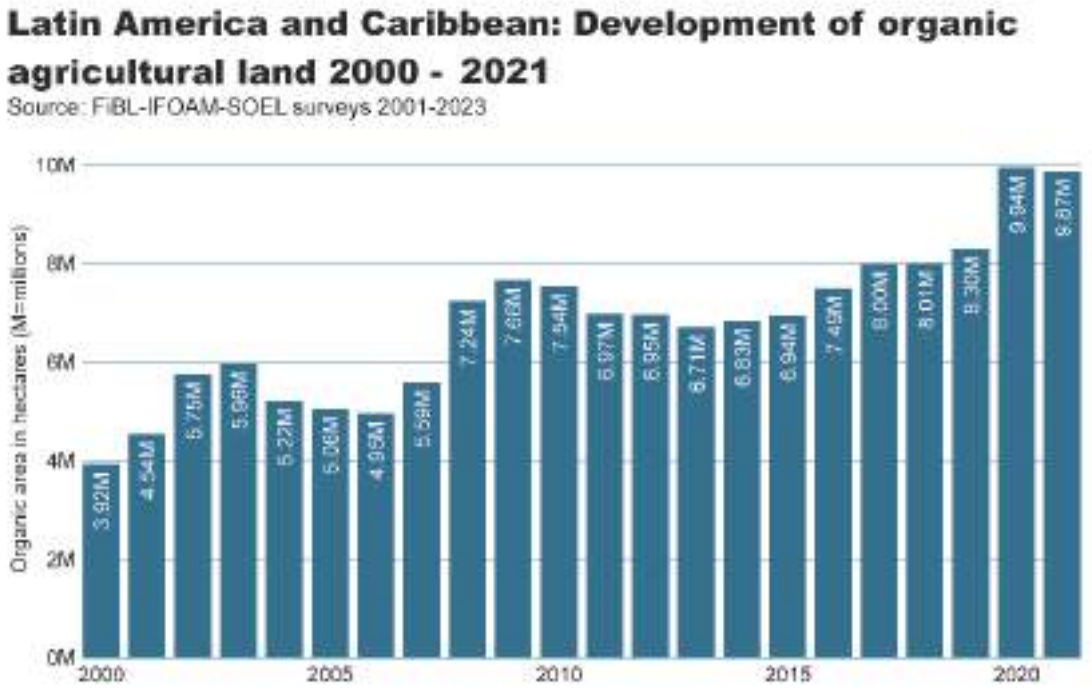


Figure 97: Latin America and the Caribbean: Development of organic agricultural land 2000-2021

Source: CIAO-FiBL-IFOAM-SOEL-surveys 2001-2023

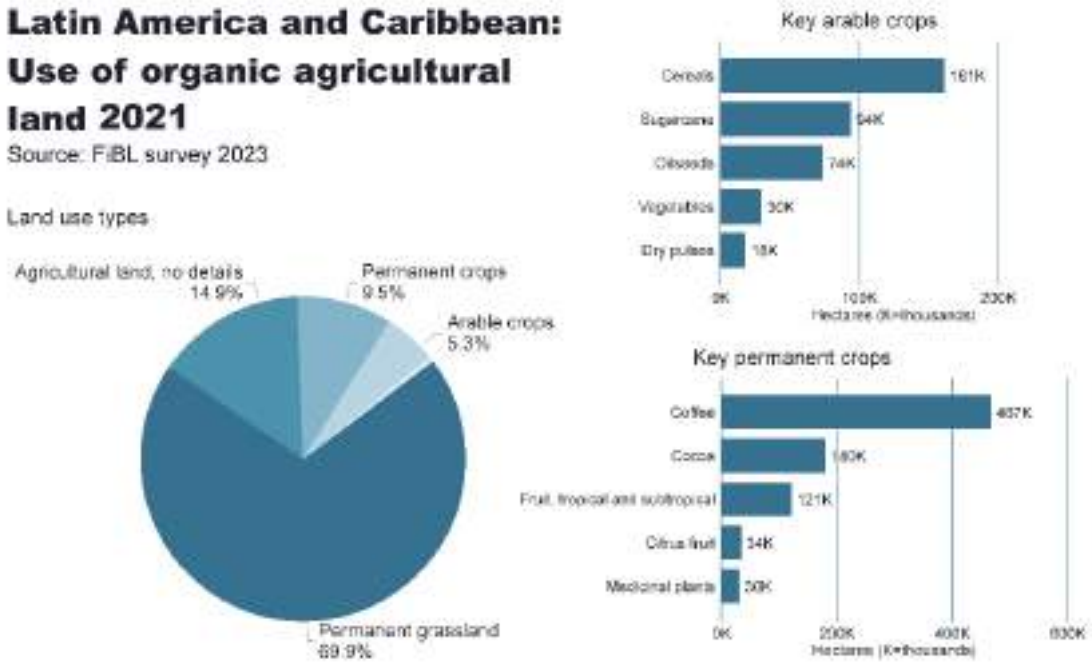


Figure 98: Latin America and the Caribbean: Use of organic agricultural land 2021

Source: CIAO-FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

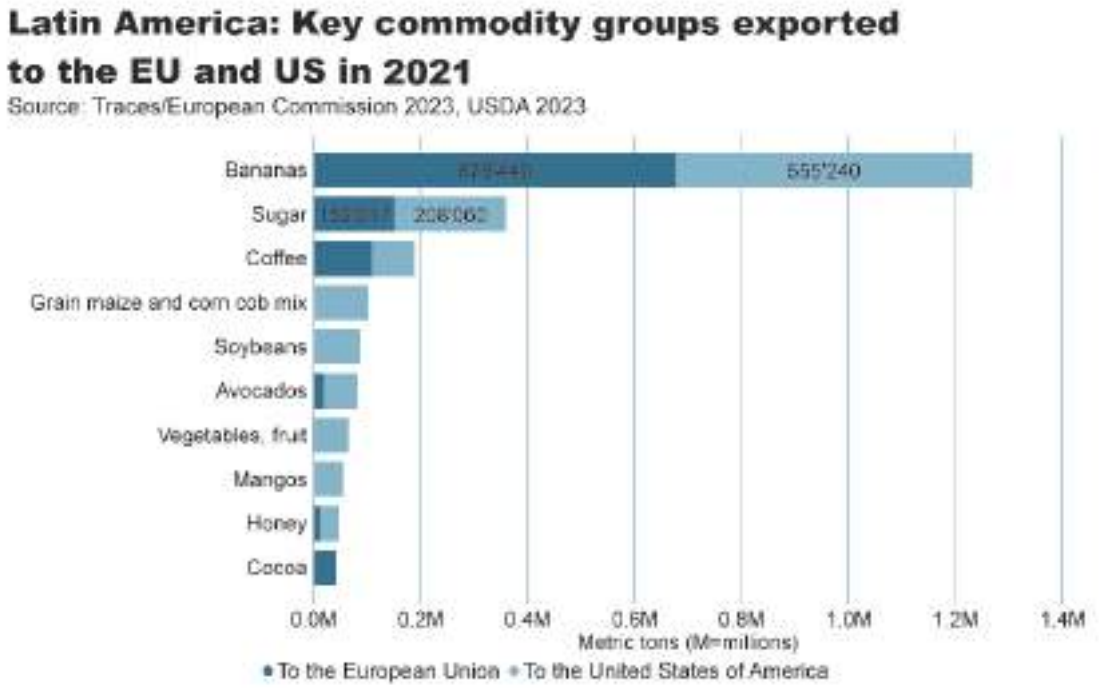


Figure 99: Latin America and the Caribbean: Key commodity groups exported to the EU and US (export volume in MT)

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

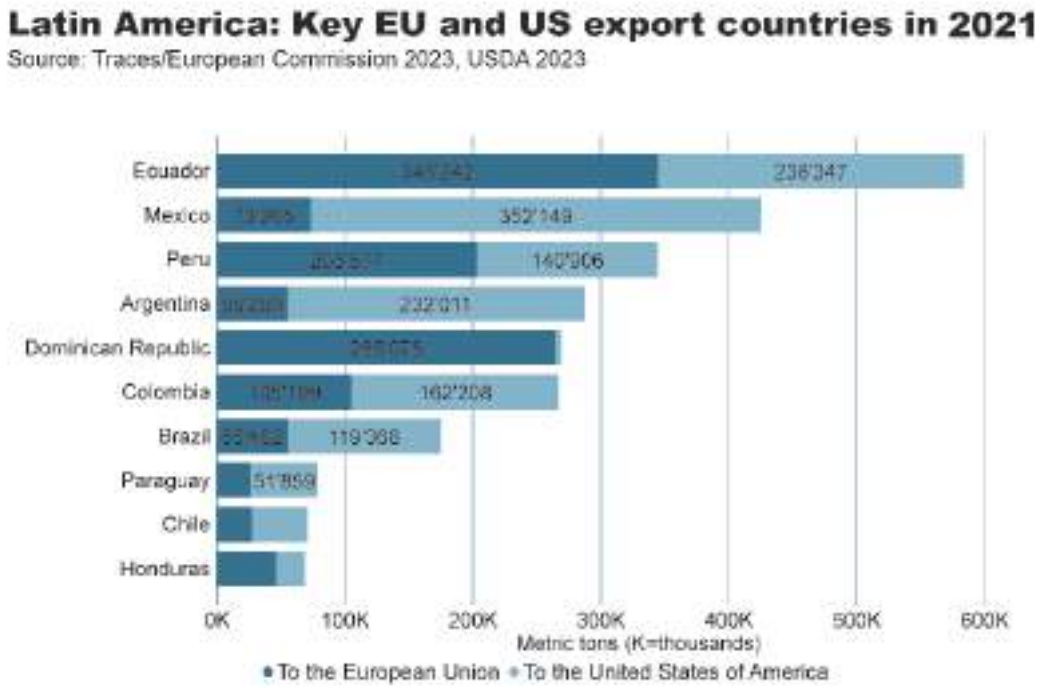


Figure 100: Latin America and the Caribbean: Key countries exporting to the EU and US (export volume in MT)

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Organic Agriculture in Latin America and the Caribbean: Tables

Table 81: Latin America and the Caribbean: Organic agricultural land, organic share of total agricultural land and number of organic producers 2021

Country	Area [ha]	Share of total agri. land [%]	Producers [no.]
Argentina	4'074'804	2.7%	1'336
Bahamas	49	0.3%	
Belize	676	0.4%	385
Bolivia (Plurinational State of)	179'425	0.5%	14'161
Brazil	1'482'406	0.6%	28'667
British Virgin Islands	26	0.4%	
Chile	152'773	1.0%	3'288
Colombia	100'874	0.2%	171
Costa Rica	10'300	0.6%	47
Cuba	2'129	0.0%	8
Dominica	2'907	11.6%	257
Dominican Republic	117'312	4.8%	15'563
Ecuador	52'185	1.0%	8'398
El Salvador	2'565	0.2%	374
Falkland Islands (Malvinas)	31'937	2.8%	3
French Guiana (France)	3'886	11.9%	69
Grenada	195	2.4%	5
Guadeloupe (France)	1'300	2.5%	186
Guatemala	71'654	1.9%	141
Haiti	2'739	0.1%	4'631
Honduras	66'179	2.0%	15'046
Jamaica	11	0.0%	2
Martinique (France)	706	2.3%	77
Mexico	238'075	0.2%	52'274
Nicaragua	37'357	0.7%	10'912
Panama	5'929	0.3%	18
Paraguay	113'147	0.5%	5'591
Peru	374'926	1.6%	117'398
Saint Lucia	25	0.2%	1
Suriname	52	0.1%	1
Uruguay	2'741'845	19.6%	1'417
Venezuela	2'496	0.0%	8
Total	**9'870'887**	**1.4%**	**280'436**

Source: CIAO and FiBL survey, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.
**Total number includes data for countries with less than three operators.*

Table 82: Latin America and the Caribbean: Land use in organic agriculture 2021

Land use	Crop group	Area [ha]
Agricultural land and crops, no details		1'466'685
Arable land crops	Cereals	161'447
	Dry pulses	17'918
	Flowers and ornamental plants	2'784
	Fresh vegetables and melons	29'600
	Industrial crops	15'466
	Medicinal and aromatic plants	8'644
	Mushrooms and truffles	281
	Oilseeds	73'619
	Plants harvested green	9'105
	Root crops	1'411
	Strawberries	3'036
	Sugarcane	93'953
	Textile crops	16'840
	Tobacco	307
	Arable crops, no details	91'364
	Fallow land	1'484
Arable land crops total		**527'258**
Other agricultural land		46'765
Permanent crops	Berries	9'564
	Citrus fruit	33'697
	Cocoa	179'689
	Coconut	7'061
	Coffee	466'922
	Fruit	97
	Fruit of temperate climate zones	9'711
	Fruit, tropical and subtropical	120'773
	Fruit/nuts/berries	10
	Grapes	20'307
	Medicinal and aromatic plants, permanent	30'338
	Nurseries	0
	Nuts	5'434
	Olives	9'609
	Tea/mate, etc.	3'324
	Permanent crops, other	38'399
Permanent crops total		**934'934**
Permanent grassland		**6'895'152**
Total		**9'870'888**

Source: CIAO and FiBL survey 2023, based on information from the private sector, certifiers, and governments For detailed data sources, see annex, page 338.

Table 83: Latin America and the Caribbean: Land use in organic agriculture 2021 by country

Country	Agricultural land and crops, no details [ha]	Arable land crops [ha]	Permanent crops [ha]	Permanent grassland [ha]	Other agricultural land [ha]
Argentina	360'460	64'218	30'331	3'619'796	
Bahamas			49		
Belize			676		
Bolivia (Plurinational State of)		123'073	9'593		46'759
Brazil	1'080'010	29'205	13'337	359'854	0
British Virgin Islands	26				
Chile		1'898	16'403	134'472	

Country	Agricultural land and crops, no details [ha]	Arable land crops [ha]	Permanent crops [ha]	Permanent grassland [ha]	Other agricultural land [ha]
Colombia		14'099	86'355	420	
Costa Rica	71	3'527	6'696		5
Cuba		2'129			
Dominica			2'907		
Dominican Republic		108	117'204		
Ecuador		18'174	34'011		
El Salvador			2'564		
Falkland Islands (Malvinas)				31'937	
French Guiana (France)	14	676	484	2'713	
Grenada		71	123		1
Guadeloupe (France)	31	689	443	136	
Guatemala	133	394	71'126		
Haiti			2'738		
Honduras	20'091	168	45'920		
Jamaica			11	0	
Martinique (France)	7	339	318	43	
Mexico		71'447	159'215	7'413	
Nicaragua		5'458	31'899		
Panama	5'929				
Paraguay		111'544	1'603		
Peru		75'076	299'850		
Saint Lucia			25		
Suriname			52		
Uruguay		3'476		2'738'369	
Venezuela	6	1'490	1'000		
Total	**1'466'871**	**527'258**	**934'934**	**6'895'152**	**46'765**

Source: CIAO and FiBL survey, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 84: Latin America and the Caribbean: All organic areas 2021

Country	Agriculture [ha]	Forest [ha]	Wild collection [ha]	Other non agri. land [ha]	Total [ha]
Argentina	4'074'804		20'559		4'095'363
Bahamas	49				49
Belize	676				676
Bolivia (Plurinational State of)	179'425		672'328		851'753
Brazil	1'482'406	15	13'761		1'496'183
British Virgin Islands	26				26
Chile	152'773		105'127		257'899
Colombia	100'874		33'750		134'624
Costa Rica	10'300				10'300
Cuba	2'129				2'129
Dominica	2'907				2'907
Dominican Republic	117'312		3'081		120'393
Ecuador	52'185	40'007	942		93'134
El Salvador	2'564				2'564
Falkland Islands (Malvinas)	31'937				31'937
French Guiana (France)	3'886	406	70		4'362
Grenada	195		0		195
Guadeloupe (France)	1'300	108	7		1'416
Guatemala	71'654		169'089		240'743
Guyana			55'449		55'449
Haiti	2'738				2'738

Country	Agriculture [ha]	Forest [ha]	Wild collection [ha]	Other non agri. land [ha]	Total [ha]
Honduras	66'179				66'179
Jamaica	11		7		18
Martinique (France)	706	87			793
Mexico	238'075		1'079'967	7'463	1'325'504
Nicaragua	37'357		3'494		40'851
Panama	5'929				5'929
Paraguay	113'147			988'604	1'101'751
Peru	374'926		219'384		594'310
Saint Lucia	25			33	58
Suriname	52				52
Uruguay	2'741'845				2'741'845
Venezuela	2'496				2'496
Total	**9'870'888**	**40'623**	**2'377'015**	**996'100**	**13'284'626**

Source: CIAO and FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 85: Latin America and the Caribbean: Use of wild collection areas 2021

Land use/products	Area [ha]
Apiculture	13'171
Forest products	2'007
Fruit, wild collection	2'900
Medicinal and aromatic plants, wild collection	41'940
Nuts, wild collection	905'544
Palmito, wild collection	56'699
Wild collection, no details	1'354'754
Total	**2'377'015**

Source: CIAO and FiBL survey, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 86: Latin America and the Caribbean: Organic exports to the EU and US by country

Country/Territory	Exports to EU and US [MT]
Argentina	287'269
Belize	35
Bolivia (Plurinational State of)	21'125
Brazil	174'820
Chile	71'264
Colombia	267'407
Costa Rica	34'042
Cuba	2'444
Dominican Republic	268'937
Ecuador	583'589
El Salvador	317
Grenada	4

Country/Territory	Exports to EU and US [MT]
Guatemala	13'202
Guyana	433
Haiti	2'174
Honduras	68'972
Jamaica	6
Mexico	425'414
Nicaragua	12'584
Panama	1'270
Paraguay	78'790
Peru	344'483
Suriname	88
Uruguay	3'612
Grand Total	**2'662'284**

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Table 87: Latin America and the Caribbean: Organic exports to the EU and US by product group

Product group	Exports to EU and US [MT]
Fruit, tropical and subtropical	1'384'705
Sugar	360'077
Coffee	187'123
Cereals	131'975
Oilseeds	98'968
Fresh vegetables and melons	69'558
Fruit, berries and nuts, prepared and preserved	58'713
Berries	56'819
Fruit of temperate climate zones	52'274
Bee products	46'737
Cocoa	43'539
Medicinal and aromatic plants	34'376
Citrus fruit	29'592
Processed and prepared fruits and vegetables	29'033
Vegetable and animal oils and fats	19'303
Beverages	15'974
Grain mill products	12'395
Strawberries	7'096
Vegetables, prepared and preserved	4'792
Aquaculture products	4'628
Cocoa, chocolate and sugar confectionery	2'297
Non-food products	1'621
Hot beverages (Coffee, tea and cacao etc.)	1'595
Nuts	1'423
Olives	1'377
Fruit	920
Dry pulses	770
Non edible animal products	724
Grapes	624
Medicinal and aromatic plants, permanent	483
Inputs	480
Meat and meat products	447
Other food products and product groups	339
Food additives	322
Root crops	266
Feedstuffs	224
Spices and aromatics	200
Noodles, couscous, etc.	103
Wild collection, other	91
Cocoa, chocolate and sugar confectionery, no details	49
Seeds and seedlings	46
Wild collection, marine	39
Yeast and other single cell micro-organisms	39
Manufactured products, other	38
Food and non-food products	21
Textile crops	20
Tea/mate, etc.	19
Prepared food, no details	11
Protein concentrates	6
Seaweed	6
Bread and bakery products	4
Other products	2
Mushrooms, prepared and preserved	1.0
Permanent crops, other	0.5
Fruit/nuts/berries	0.3
Grand Total	**2'662'284**

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Table 88: Brazil: Development of the number of producers and the organic area according to the Ministry of Agriculture, Livestock and Food in Brazil *

	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021
Producers	5'934	6'719	10'194	11'478	14'222	17'451	17'473	19'978	22'966	26.622
Area (million hectares)	1.554*	0.603	0.749	0.940	1.094	0.654	0.719	0.822	0.945	1.1

Source: Ministério da Agricultura, Pecuária e Abastecimento. All data include PGS-certified producers and areas.
** Includes wild collection area*

North America



Map 6: Organic agricultural land in Canada and the United States 2021

Source: Canada Organic Trade Association (COTA) and United States Department of Agriculture (USDA). For detailed data sources, see annex, page 338.

Organic in the United States: Ensuring Organic's Growth and Integrity

Angela Jagiello[1]

Building the next generation of American organic producers

The United States Department of Agriculture (USDA) in June 2022 took real steps to build the next generation of American organic producers and strengthen organic supply chains with its announcement that it would invest 300 million US dollars[2] over five years to support farm operations during the transition to organic in its new Organic Transition Initiative. The announcement represents the largest single investment in organic by USDA.

The initiative will deliver wrap-around technical assistance, including farmer-to-farmer mentoring; provide direct support through conservation financial assistance and additional crop insurance assistance; and support market development projects in targeted markets to a press release from USDA.

The Organic Transition Initiative program will include the following:

1 One hundred million US dollars dedicated to the Transition to Organic Partnership Program (TOPP). USDA will establish cooperative agreements with lead non-profits in six regions to develop partnership networks that connect transitioning farmers with mentors for at least one year after certification; build paid mentoring networks to share practical insights and advice; provide community-building opportunities; help transitioning and recently transitioned producers overcome technical, cultural, and financial shifts during and immediately following certification and engage educational and training institutions on organic workforce training and education and future human capital planning.

2 Seventy million US dollars dedicated to USDA's Natural Resources Conservation Service (NRCS). The USDA's NRCS will offer financial assistance and conservation planning to farmers choosing to implement a new Organic Management conservation practice standard.

3 One hundred 100 million US dollars dedicated to pinpointed market development. The USDA's Agricultural Marketing Service (AMS) will work with partners to identify innovative ways to build organic supply chains in targeted markets to ensure transitioning organic producers have access to processing, storage, distribution, and consumer markets.

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[1] Angela Jagiello, Director of Education and Insights at the Organic Trade Association, Washington D.C.; United States, www.ota.com

[2] 1.1827 US dollars corresponded to 1 euro in 2021, according to the Central European Bank.

4 Thirty million US dollars dedicated to establishing organic expertise at NRCS regional technical support centers and providing crop insurance support for qualifying transitional organic operations.

The Organic Trade Association looks forward to the lasting impacts the initiative will have on organic, including the expansion of climate-smart agriculture practices, more economically sound rural communities, more help for beginning and socially disadvantaged farmers and ranchers, and increased access to organic foods for consumers.

2023 Farm Bill policy priorities for organic

The Farm Bill sets U.S. agriculture policy and is reauthorized by Congress through the House and Senate Agriculture Committees roughly every five years. This massive piece of legislation includes provisions covering nutrition, commodities, conservation, trade, rural development, research, forestry, energy, horticulture and organic agriculture, livestock, crop insurance, and more. In addition to updating programs and policies, Congress also determines the funding levels for various programs at USDA. As the process of creating a new national Farm Bill begins, Organic Trade Association has identified several priorities for the U.S. organic industry.

Continuous improvement and accountability in organic standards

A recent study commissioned by the trade association found that 89 percent of consumers say the USDA should review and update the federal organic standards regularly, and 87 percent of consumers expect organic standards to be updated to reflect evolving understandings about soil, climate, toxicology, animal welfare, etc. It's been 20 years since the organic regulations went into effect, but despite growing consumer demand and industry consensus on nearly two dozen updates, the standards have remained static, with only two updates implemented in the last two decades.

Market development

- Provide funding, support and incentives for organic transition based on market needs.
- Provide funding for market and processing infrastructure to address supply chain constraints and increase domestic production of organic crops.

Climate and conservation

- Establish and provide funding for a technical assistance program for organic and transitioning farmers.
- Provide more conservation assistance for organic farmers to improve environmental outcomes such as fostering soil health, increasing biodiversity and natural resource conservation.

Core Farm Bill Program improvements

- Increase funding for the Organic Research and Education Initiative and Certification Cost-Share Program.

– Include programmatic changes to streamline and improve access for organic farmers for cost-share, crop insurance, conservation, risk management and other farm bill programs.

International trade

– Increase funding for the Market Access Program, Foreign Market Development Program and Technical Assistance for Specialty Crops.

Organic market expanded despite unprecedented supply chain challenges

Following a year marked by pantry loading and supply shortages, U.S. shoppers returned to more stable shopping patterns in 2021. Between 2020 and 2021, U.S. organic sales surpassed 63 billion US dollars, with 1.4 billion US dollars (2 percent) total growth over the year. Food sales, which comprise over 90 percent of U.S. organic sales, rose to 57.5 billion US dollars (roughly 2 percent growth), and non-food sales reached 6 billion US dollars (in sales 7 percent growth), according to the Organic Trade Association's *2022 Organic Industry Survey*.

While consumer demand for organic products remained strong, growth continued but was constrained primarily due to the supply challenges, which ran the gamut from seed and raw materials shortages to those in labor and packaging materials to skyrocketing costs in feed, inputs, shipping and transportation. While this list is not unique to the U.S. organic industry, its impact had a lasting effect.

Logistics not only created a challenging environment in which to do business, they also drove inflationary impacts, leading to increases in pricing across the supply chain all the way to the shelf, where there was a steady stream of "out of stocks" throughout the year.

The good news, however, is that U.S. families value organic more than ever. As a result of the pandemic, there is a renewed interest in personal health and well-being amongst shoppers, which led many to see organic products as a solution.

Consumer education is critical

In the U.S., many companies note that other eco-labels and certifications outside of the USDA Organic seal have grown in popularity because consumers don't fully understand all that organic means. For organic to stay relevant across the industry, there is a call for continued education. Although organic has had a presence in the retail market and the grocery aisles for some time now, many consumers still do not appreciate its importance. With inflation and rising prices, the value of organic needs to be articulated even more. Many see the evolution of organic standards as essential to building consumer awareness and education.

Tom Chapman, Organic Trade Association CEO, notes: "As we move through periods of economic uncertainty, people will naturally become more selective about how they spend their dollars. But they still need to feed and clothe their families, and they would prefer to do so in a way that aligns with their values. As the custodians of this production system so rich with benefits for people and the planet, it's on us to find and

voice our message for the moment – that organic has always been sustainable, regenerative, and so much more."

To help the U.S. business community communicate the human, planetary and economic benefits associated with organic, the Organic Trade Association has developed a data-driven communications toolkit. The package – available at ota.com/organic opportunity – includes a full complement of resources to help businesses communicate the organic benefits and combat misinformation about competing (but unregulated and unverified) labels.

Gains at the federal government level

With the energy of a new federal administration, in 2021, organic stakeholders advocated for the bipartisan Continuous Improvement and Accountability in Organic Standards Act to ensure that the organic sector's advancement continues. The federal regulatory apparatus had fallen behind the evolving organic sector, slowing innovation and improvement within the industry. This legislation corrects the course forward.

Traction was gained in early 2022 when the USDA published a preview of the long-awaited Origin of Livestock final rule for organic dairy. The change to the regulation, which organic stakeholders have long advocated for, will promote a fairer and more competitive market for all organic dairy producers by making sure certified organic dairy products are made to the same consistent standard.

On the horizon: Strengthening organic enforcement

The USDA's National Organic Program published the mammoth Strengthening Organic Enforcement Proposed Rule in 2020 to support the continued growth of the organic market and improve oversight at critical links in the supply chain. The final rule is expected to be published in early 2023. The new requirements will close gaps in the current regulations to build consistent certification practices to deter and detect organic fraud, improve transparency and traceability of organic products throughout the supply chain, and protect organic integrity. The unprecedented regulation will have significant and far-reaching impacts on the organic sector and represents the most significant change to federal organic regulations since the creation of USDA's National Organic Program more than 20 years ago.

Industry to USDA: Let organic chickens roam

The USDA also took a serious step toward updating key organic animal welfare provisions first introduced over twenty years ago with the publication in August of its proposed Organic Livestock and Poultry Standards (OLPS) rule. Tens of thousands of U.S. organic stakeholders and consumers submitted comments urging the USDA to swiftly implement the OLPS rule, saying that strengthening organic animal welfare standards is long overdue and critical for the sustainability of family farms, the advancement of organic, and the continued trust of consumers in the organic label.

USDA's public comment period for the proposed OLPS regulation ended on Nov. 10. The proposed rule drew overwhelming public support – initial analysis showed that out of 39'090 posted comments, a vast majority of 89 percent were in favor of this

regulation being finalized and implemented – ensuring that organic animals have true outdoor access and closing regulatory loopholes that have led to uneven animal welfare standards and unfair conditions for organic farmers who are already raising their birds by the highest organic practices.

USDA will now review all the submitted comments, after which it will finalize and publish the final rule, expected in April 2023 at the earliest but likely later in the year.

Organic is climate-smart

As part of USDA's Partnerships for Climate Smart Commodities initiative, the agency chose about a dozen organic organizations to participate in transformative projects designed to reduce agriculture's carbon footprint.

The department awarded 2.8 billion US dollars worth of cost-share grants for 70 climate-smart projects that the agency estimates have the potential to sequester more than 50 million metric tons of carbon dioxide equivalent.

The organic industry is excited to be part of this critical initiative. Organic agriculture has always been a leader in implementing environmentally friendly practices and addressing the critical issue of climate change.

International trade updates

Global demand for American-produced organic products has never been greater. Department of Agriculture statistics show the value of U.S. organic exports nearly doubled between 2011 and 2021 – increasing from around 400 million US dollars to just over 700 million US dollars – including an almost 10 percent increase from 2020 to 2021. Canada and Mexico are the United States' largest export partners, with Japan, South Korea, Taiwan, the EU, and the United Arab Emirates all making the top 10 list for U.S. organic exports.

U.S. organic exporters received a record level of funding of more than 1 million US dollars from the USDA's Market Access Program (MAP) to promote U.S. organic products around the world in 2023. The award, totaling 1'011'911 US dollars in new funding to the Organic Trade Association, is an almost 10 percent increase from the 2022 levels and the most significant MAP award ever received by organic exporters.

American-produced organic products will be showcased to a diverse global audience in the coming year. There are currently ten international activities planned for 2023 -- from the world's biggest organic trade fair in Germany Biofach to trade missions stretching across Europe, Asia and the Middle East.

In addition to the headline events in 2023, the grants will continue consumer promotion activities focused on Canada, Japan, Korea, the Pacific Rim, and worldwide organic education and promotion.

U.S. ends organic recognition agreement with India

In other international news, 2022 saw challenging and evolving trade relationships with India. In January 2021, the USDA National Organic Program revoked its organic recognition agreement with India's Agricultural and Processed Food Products Export

Development Authority (APEDA), citing a need for greater oversight of products coming from India. All operations in India seeking to export to the US needed to be directly certified by a USDA-accredited certifier by July 2022. This move was compounded in March 2022 by a U.S. antidumping investigation which found that the Indian government was subsidizing organic farmers, allowing organic soybean mean producers to sell into the U.S. market at less than a fair market value. Meanwhile, in Mexico, the deadline for companies to fall in line with the Mexico Compliance Program for organic went into effect in early January 2022.

U.S. organic industry works to ensure integrity throughout the supply chain

The success of the organic sector relies entirely on consumer trust in the organic label. Supply chains compromised due to fraud erode consumer trust in the integrity of the organic brand and hurt organic farmers everywhere. It is critical that every organic business has a system in place that will prevent fraud and support the promise of providing organic products that people can trust.

In the U.S., the private sector is working with USDA to protect the organic sector from criminal activity. Every stakeholder in the industry is responsible for maintaining organic integrity throughout their business practices. Further, Organic Trade Association has invested significant time and resources in developing a program that will help certified operations become compliant with the forthcoming Strengthening Organic Standards rule.

A key component of the program is an online training course and supplemental program guide, which provides the framework for assessing vulnerabilities and implementing an organic fraud prevention plan. The course, "Developing an Organic Fraud Prevention Plan," was created in partnership with the Michigan State University Food Fraud Initiative and is offered through the Food Fraud Prevention Academy along with many other educational resources.

The USDA's Organic Integrity Learning Center offers additional courses such as "Preventing the Organic Fraud Opportunity" and "Organic Fraud and the Criminal Mind."

Strong action is needed, and everyone has a role in fighting fraud and maintaining organic integrity.

Organic is for everyone

The Organic Trade Association's racial equity and inclusiveness initiatives came into focus within the last two years with the formation of the Diversity Council and the establishment of a Diversity & Entrepreneurship Program and Fund, which aims to increase BIPOC (Black, Indigenous, and People of Color) and Latino representation in both the OTA and the organic industry.

In 2022, OTA reported several milestones as part of its commitment to creating a more just, equitable, diverse and inclusive organic business community in the U.S, including:

1 Welcoming 53 unique companies to participate in its Diversity and Entrepreneurship program, offering (among other benefits) complimentary memberships to Black, Indigenous, and People of Color-owned farms and businesses.
2 Launching an online Diversity Resource Library – a collection of resources to help the organic community diversify its business operations. The library was produced by OTA's inaugural class of Diversity Fellows.
3 Formalizing partnerships with organizations whose missions align with OTA's vision of encouraging a more diverse industry, including the Black Farmers' Index and National Latino Farmers and Ranchers.

The U.S. organic business community will continue to stand together to shape a more inclusive agricultural future for the good of the organic market and our communities.

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Canada

TIA LOFTSGARD[1]

The organic marketplace in Canada continues to expand. Canada is now the fifth largest organic market in the world and is home to 7998 certified organic operations. While production numbers have never kept pace with the demand in Canada, 2021 did experience less growth in producers and acreage than in prior years.

Canadians are committed to organic in many sectors of our economy — as consumers, farmers, educators, exporters, researchers and manufacturers. There is a shared recognition that the organic industry is not just about environmental stewardship, healthful eating choices, or supporting local farmers – it's about all those things.

At present, the Canada Organic Regime (COR) provides oversight and certification for seed, food and beverages, and livestock and livestock feed. There are many other industry sectors in Canada using organic ingredients and selling organic products, including supplements, textiles, personal care and pet foods that are not regulated by the federal government.

Continued strong demand for organics

Organic food and beverage sales in 2021 topped 7.236 billion Canadian dollars[2] in 2021. The total organic sector, including other non-regulated products such as textiles, pet food, etc., grew to 9.35 billion Canadian dollars in 2021. The non-food segments grew at a higher rate than food and beverages (14.9 percent versus 10.2 percent), which is reflective of the fact that these segments, even though not regulated under the COR, remain a growth opportunity for organic producers. While the overall growth rate is higher than that of our American neighbours to the south, the Canadian organic industry still has more growth ahead before reaching the same level of maturity as seen in the United States.

Food and beverages account for just over 80 percent of the organic market, followed by alcoholic beverages at 5.3 percent and organic fibre and supplements, each representing close to 2.5 percent.

Slowed growth in certified organic farms and processors

The Canadian organic sector continued to experience some disruptions like most other regions of the world. Yet, nominal growth (5 percent) still occurred, bringing 374 new businesses to certify their production practices as organic. At the end of 2021, there were a total of 7998 certified operations. There was a 5 percent increase in certified producers (130 producers), bringing the total amount of farmers in Canada to 6'916. The livestock sector declined slightly by 2 percent to 784 certified livestock operations. Certified

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[1] Tia Loftsgard, Executive Director, Canada Organic Trade Association, Ottawa, Canada, www.canada-organic.ca

[2] In 2021, according to the Central European Bank, 1.4826 Canadian dollars corresponded to 1 euro.

processors experienced nominal growth of .4 percent, with only eight new manufacturers registering.

More Canadian land is becoming certified

A total of 37'300 acres (14'973 hectares) were in the transition phase of becoming certified in 2021. Although there was a decrease in acreage in Canada between 2020 and 2021 due to climatic conditions, decertifications and supply chain challenges due to COVID-19, there are more producers that will be entering the system in 2-3 years. Canada is currently home to more than 3.051 million acres of organic farmland (1.2 million hectares).

Where Canadians purchase organic is changing

Mass market grocery store channels continue to capture the majority of Canadian organic food and beverage dollars, a lead that was strengthened by pandemic restrictions during 2020. Online purchase options, which had seen strong growth in 2019-2020, were chosen by a growing number of first-time users in Canada who chose not to leave their homes for grocery shopping in 2021.

National natural health chains and club/warehouse stores have continued their support for organic, and sales have followed suit. Once the mainstay of organic retailing in Canada, the landscape of independent natural health food stores is shifting through attrition and amalgamation into smaller regional chains.

Increased emphasis on the healthfulness of food, as well as local supply and food security concerns, drove continued support of farmers' markets across Canada. Restaurant closures as a result of pandemic measures resulted in a significant drop in organic sales through food service channels which is slowly starting to pick up.

Canada's position in the global marketplace

Canada continues to be a net importer of organics on the world stage. Looking at Harmonized Sales (HS) code data provided by the federal government, Canadian exports have declined hugely in the past year. Data reveals that organic exports decreased from 2020 volumes of 609 million Canadian dollars in export sales to just 417 million in 2021. As stated previously, only 17 commodities are tracked using the HS system[1]; therefore, this export figure represents only a portion of all Canadian organic products exported in 2021.

2021 Canadian organic imports totaled more than 859 million Canadian dollars, up from 800 million in 2020. Ontario imports almost one-half of Canada's organics, followed by British Columbia at 30 percent; however, both provinces are the points of entry for those products and not solely the regions of consumption. Unroasted coffee and bananas continue to top Canada's organic import lists in both volume and dollar value.

[1] The Harmonized Commodity Description and Coding System, also known as the Harmonized System (HS) of tariff nomenclature is an internationally standardized system of names and numbers to classify traded products. For more information see https://en.wikipedia.org/wiki/Harmonized_System.

Organic equivalency arrangements continue to provide smooth market access for both importers and exporters. Canada signed new equivalency arrangements in 2020 with Taiwan and the United Kingdom and expanded the scope of the Japan arrangement to include livestock. Discussions started in 2021 with Japan to include alcohol under the scope of the agreement in the future as well. Canada continues discussions with both Mexico and South Korea for future equivalency arrangements.

Organic Agriculture in North America: Key Facts and Figures

Jan Trávníček[1], Bernhard Schlatter[2] and Helga Willer[3]

North America had nearly 3.5 million hectares of organic farmland in 2021

In North America, more than 3.5 million hectares were managed organically in 2021. Over 4.6 percent of the world's organic farmland was in North America.

With only two countries reporting organic farmland in North America, the US had the largest farmland area under organic management, followed by Canada (almost 1'216'000 hectares).

In North America, organic farmland decreased by more than 200'000 hectares.

Organic land decreased by 202'023 hectares in North America from 2020 to 2021, representing a decrease of 5.4 percent. This was mainly due to a decrease in organic farmland in Canada reported in 2021. 2021 data was not available for the US. From 2012 to 2021, organic farmland grew by 17.6 percent.

North America: Organic farmland share is at almost 1 percent

Organic farmland in North America constituted 0.8 percent of the continent's total agricultural land and was thus below the global organic area share of 1.6 percent in 2021.

The US reported a share of 0.6 percent, followed by Canada with a 2.1 percent share.

Key crops grown are cereals, oilseeds and dry pulses

Almost 40 percent of the organic farmland in North America was used for arable crops (1.5 million hectares). Among the key crops were cereals (661'473 hectares), oilseeds (160'199 hectares) and dry pulses (111'703 hectares).

Permanent crops accounted for approximately 10 percent of total organic land in North America in 2021. Among the key crops were berries (49'746 hectares), grapes (28'736 hectares) and temperate fruit (19'184 hectares).

More than 23'000 farmers

There were more than 23'392 organic producers in North America. A total of 16'476 producers were counted in the US and 6'916 in Canada.

53.9 billion euros in retail sales

Organic retail sales for North America reached 53.9 billion euros in 2021. The USA, which is the largest single market in the world (followed by the European Union), reported retail sales of 48.6 billion euros, whereas Canada had 5.3 billion euros.

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[1] Jan Trávníček, Czech Organics, Staré Město, Czech Republic, www.czechorganics.com
[2] Bernhard Schlatter, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[3] Dr. Helga Willer, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org

Organic exports – strong growth

US organic import and export data has been available since 2014, whereas data on organic export volumes in metric tons to the European Union has been available since 2018.

Data show that in 2021 over 180'302 metric tons of products were exported from North America to the EU and US/Canada, constituting 3.8 percent of all organic exports to these countries or trade blocks. In the 4-year period from 2018 to 2021, North American exports increased by almost 42 percent, growing considerably faster than global organic exports to the EU and US, which grew by only 5 percent in the same period.

Canada exports mainly to the US

The larger North American exporter was Canada, with more than 168'404 metric tons of products, mainly cereals and soybeans. Canada exported almost 140'000 metric tons to the US and more than 30'000 metric tons to the EU. US exports to the EU reached almost 12'000 MT.

Cereals are the most important export product

With almost 109'000 metric tons and almost 60 percent of the North American organic exports, cereals (mainly maize, oats and wheat) were the most important product group, followed by oilseeds (33'725 MT) and berries and nuts (8'258 MT) (Figure 23).

For more information about the North American figures, see figures and data tables, on the following pages.

Organic Agriculture in North America: Graphs

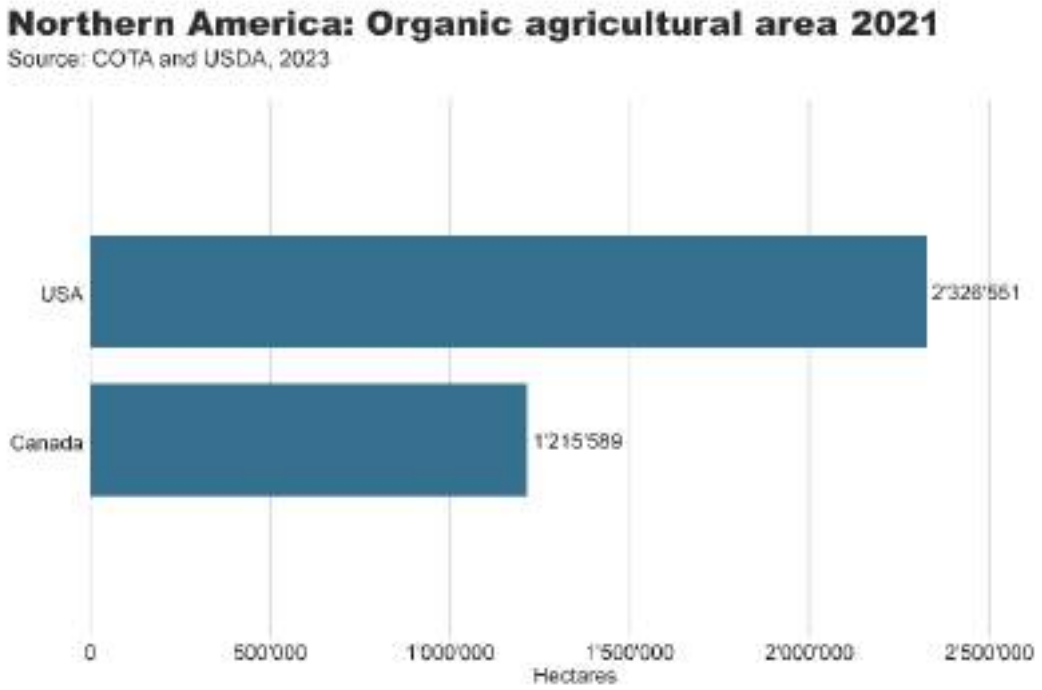


Figure 101: North America: The ten countries with the largest organic agricultural area 2021

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

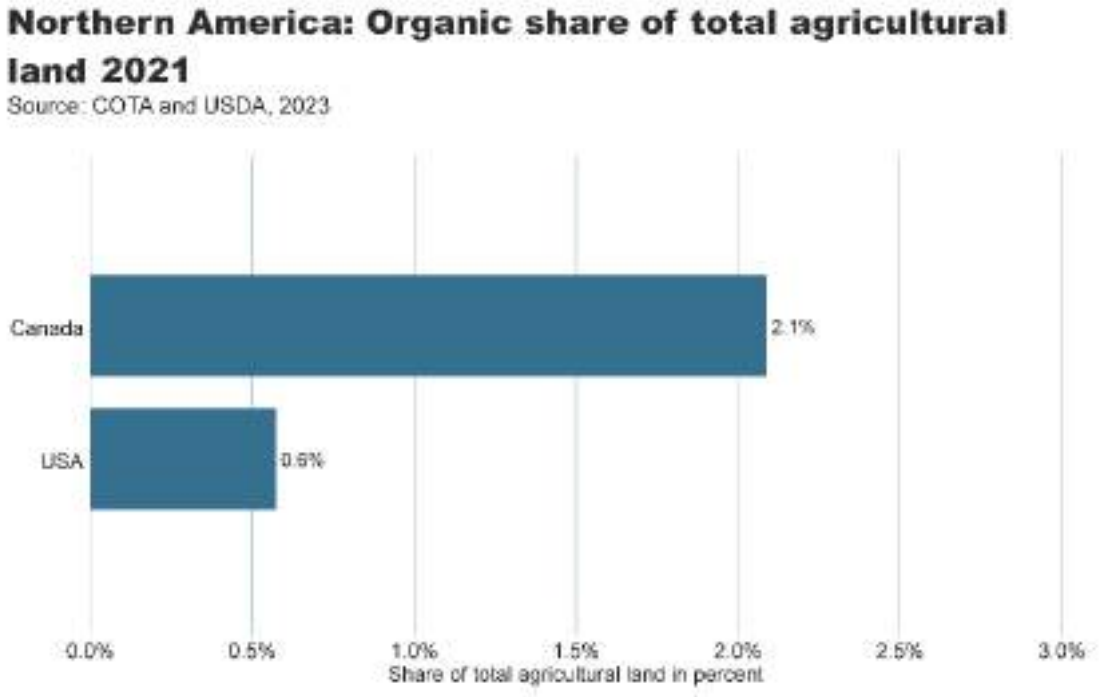


Figure 102: North America: The countries with the highest organic share of total agricultural land 2021

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

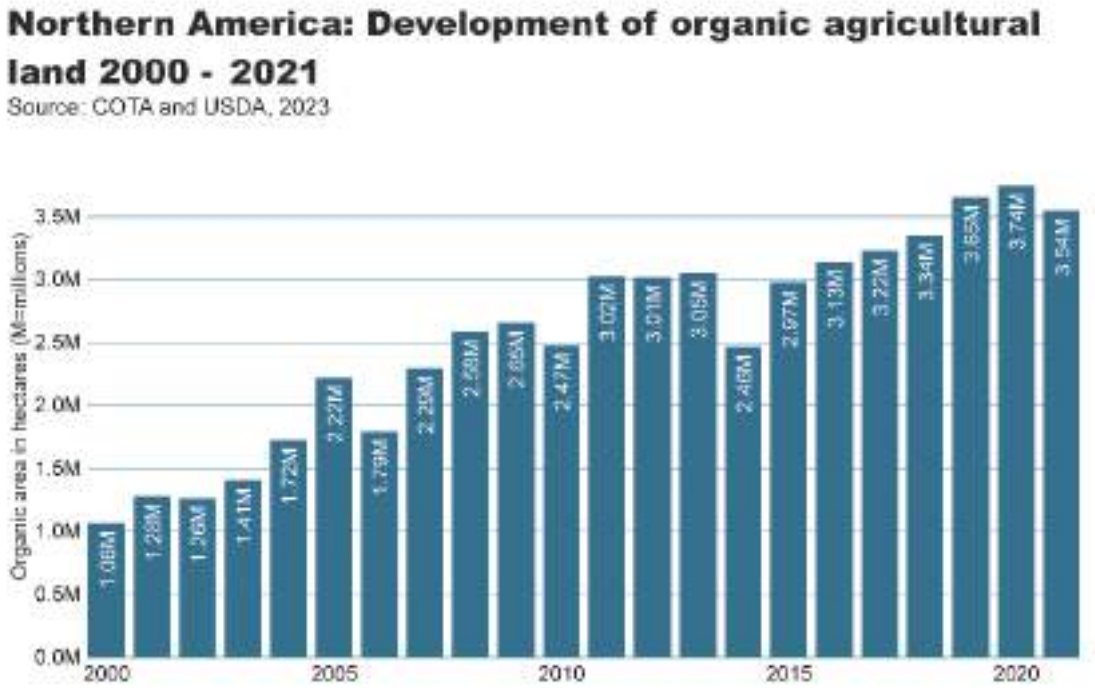


Figure 103: North America: Development of organic agricultural land 2000-2021

Source: FiBL-IFOAM-SOEL-surveys 2001-2023 based on national data sources

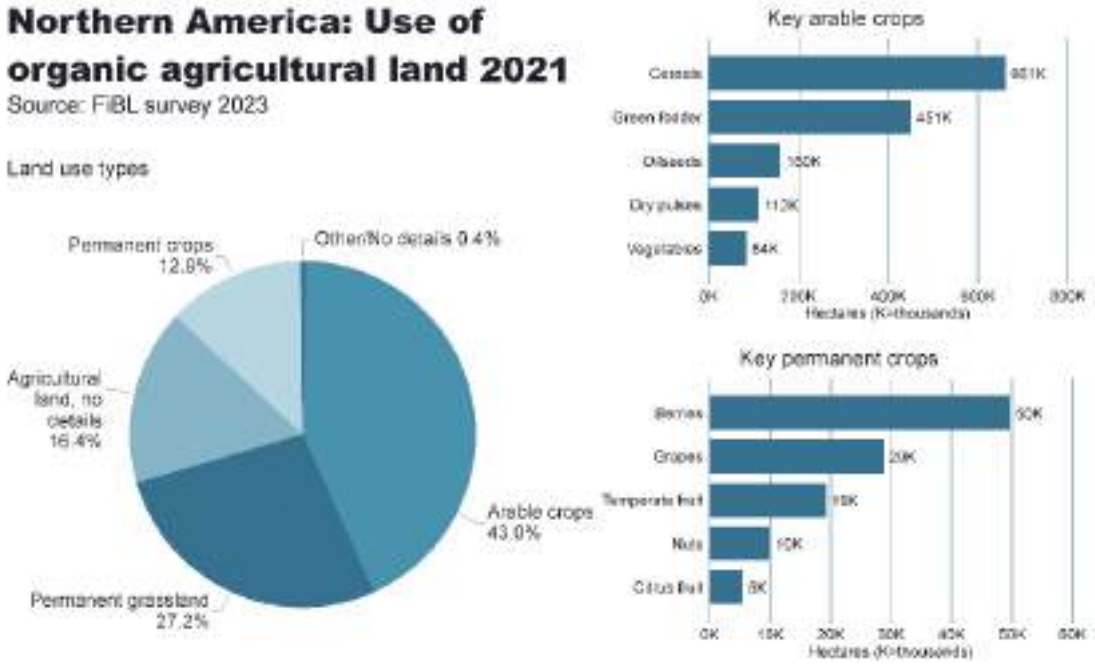


Figure 104: Northern America: Use of organic agricultural land 2021

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

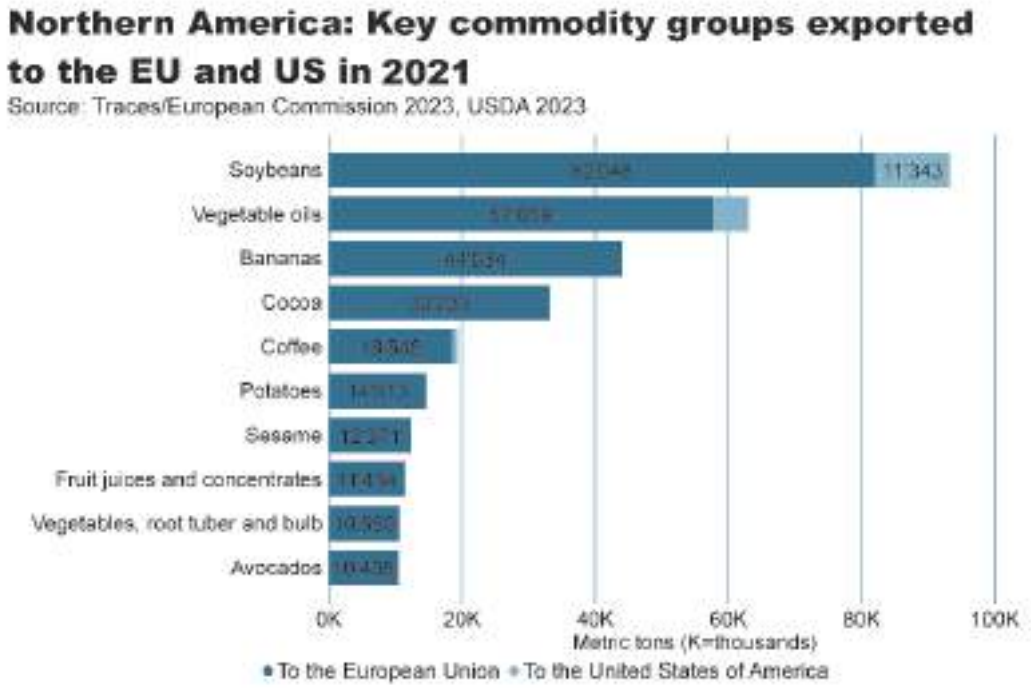


Figure 105: North America: Key commodity groups exported to the EU and US (export volume in MT)

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

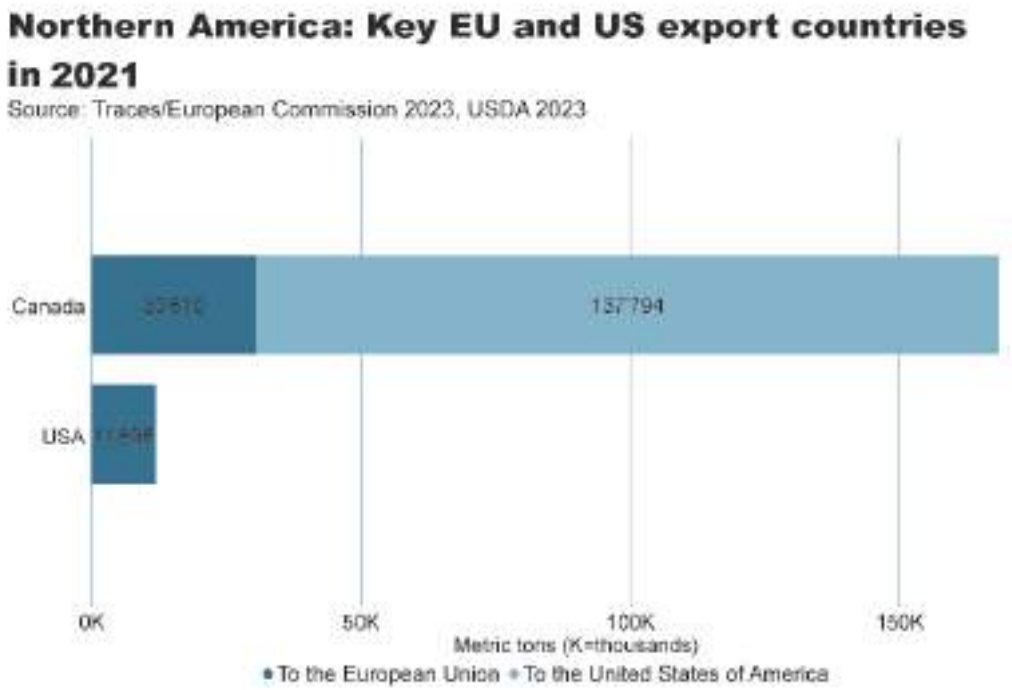


Figure 106: Northern America: Key countries exporting to the EU and US (export volume in MT)

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Organic Agriculture in North America: Tables

Table 89: Northern America: Organic agricultural land, organic share of total agricultural land and number of organic producers 2021

Country	Area [ha]	Share of total agri. land [%]	Producers [no.]
Canada	1'215'589	2.1%	6'916
United States of America	2'326'551	0.6%	16'476
Total	**3'542'140**	**0.8%**	**23'392**

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

Table 90: Northern America: Land use in organic agriculture 2021

Land use	Crop group	Area [ha]
Agricultural land and crops, no details		581'488
Arable land crops	Cereals	661'473
	Dry pulses	111'703
	Cereals	661'473
	Flowers and ornamental plants	30
	Fresh vegetables and melons	84'147
	Medicinal and aromatic plants	1'288
	Mushrooms and truffles	207
	Oilseeds	160'199
	Plants harvested green	450'859
	Root crops	13'596
	Seeds and seedlings	59
	Strawberries	2'167
	Textile crops	28'517
	Fallow land	1'008
	Arable crops, other	6'847
Arable land crops total		**3'390'547**
Other agricultural land		15'589
Permanent crops	Berries	49'746
	Citrus fruit	5'403
	Coffee	115
	Fruit	670
	Fruit of temperate climate zones	19'184
	Fruit, tropical and subtropical	5'122
	Grapes	28'736
	Nurseries	77
	Nuts	9'942
	Olives	628
	Permanent crops, other	338'387
Permanent crops total		458'009
Permanent grassland		964'953
Total		**3'542'140**

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

Table 91: Northern America: Land use in organic agriculture 2021 by country

Country	Agricultural land, no details [ha]	Arable land [ha]	Permanent crops [ha]	Permanent grassland [ha]	Other agricultural land [ha]
Canada		661'725	385'369	152'907	15'589
United States of America	581'488	860'376	72'639	812'047	
Total	**581'488**	**1'522'101**	**458'009**	**964'953**	**15'589**

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

Table 92: Northern America: All organic areas 2021

Country	Agriculture [ha]	Forest [ha]	Wild collection [ha]	Total [ha]
Canada	1'215'589	8'507	7'810	1'231'907
United States of America	2'326'551	205'196	596	2'532'342
Total	**3'542'140**	**213'703**	**8'406**	**3'764'249**

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

Table 93: Northern America: Use of wild collection areas 2021

Land use	Area [ha]
Berries, wild collection	596
Wild collection, no details	7'810
Total	**8'406**

Source: USDA and COTA 2022. For detailed data sources, see annex, page 338.

Table 94: Northern America: Organic retail sales in 2021

Country	Retail sales, all [Million €]	Retail sales, all [€/person]
United States of America	48'617.6	146.5
Canada	5'283.7	138.1
Total	**53'901.3**	**143.7**

Source: OTA for USA and COTA for Canada 2022. For detailed data sources, see annex, page 338.

Table 95: Northern America: Organic exports to the EU and US by country (totals)

Country	Export to USA [MT]	Export to EU [MT]	Export to EU and USA [MT]
Canada	137'794	30'610	168'404
United States of America		11'898	11'898
Total	**137'794**	**42'508**	**180'302**

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Table 96: Northern America: Organic exports to the EU and US by commodity

Product group	Exports to EU and USA [MT]
Cereals	108'815
Oilseeds	33'725
Fruit, berries and nuts, prepared and preserved	8'258
Sugar	7'911
Dry pulses	6'282
Coffee	3'375

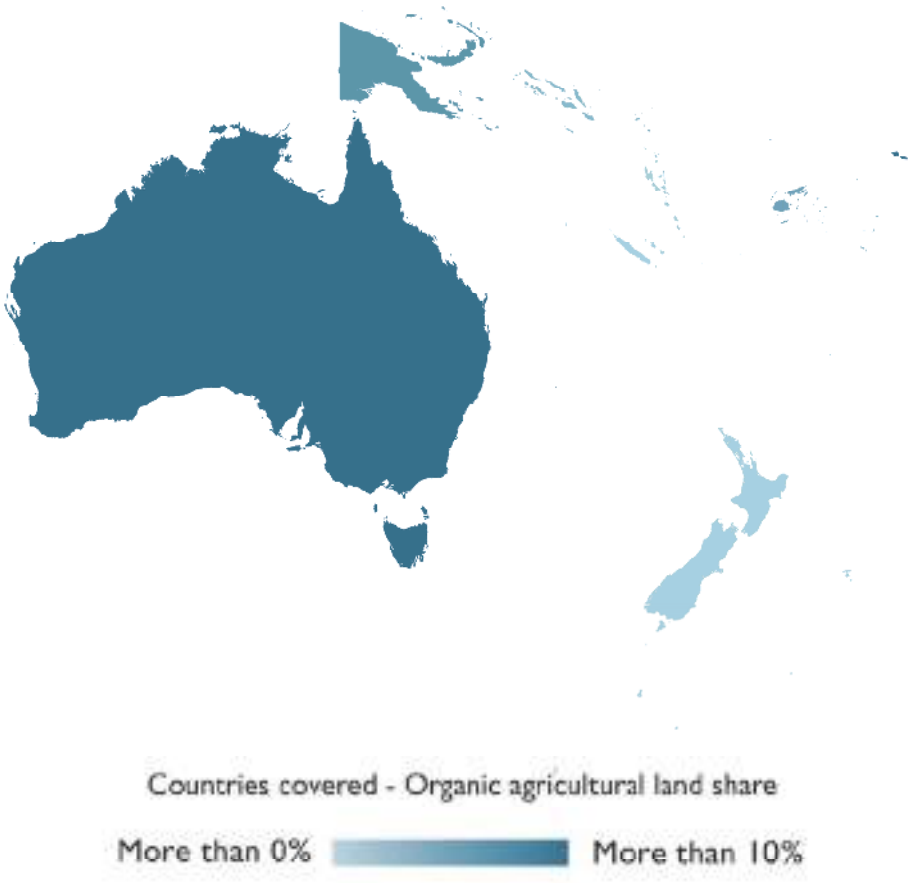
Product group	Exports to EU and USA [MT]
Processed and prepared fruits and vegetables	1'406
Vegetable and animal oils and fats	1'389
Root crops	1'292
Nuts	929
Vegetables, prepared and preserved	874

Product group	Exports to EU and USA [MT]
Beverages	777
Fruit of temperate climate zones	684
Grain mill products	644
Hot beverages (Coffee, tea and cacao etc.)	505
Fresh vegetables and melons	349
Strawberries	342
Non-food products	339
Bread and bakery products	286
Grapes	242
Berries	233
Fruit, tropical and subtropical	231
Tea/mate, etc.	176
Prepared food, no details	154
Seaweed	136
Feedstuffs	135
Bee products	125
Hops	112
Other food products and product groups	72
Medicinal and aromatic plants	64
Cocoa, chocolate and sugar confectionery, no details	59
Seeds and seedlings	57
Cocoa	43

Product group	Exports to EU and USA [MT]
Medicinal and aromatic plants, permanent	39
Noodles, couscous, etc.	39
Food additives	37
Meat and meat products	32
Textile crops	24
Plants harvested green	24
Protein concentrates	24
Other products	13
Spices and aromatics	10
Olives	9
Milk and dairy products	8
Mushrooms, prepared and preserved	7.5
Yeast and other single cell micro-organisms	5
Bakery and farinaceous products	3
Wild collection, other	3
Cocoa, chocolate and sugar confectionery	2
Food and non-food products	1
Fruit/nuts/berries	1.3
Permanent crops, other	1.2
Manufactured products, other	0.4
Mushrooms and truffles	0.03
Grand Total	**180'302**

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Oceania



Map 7: Organic agricultural land in the countries of Oceania 2021

Source: FiBL survey 2023, based on information from the private sector, certifiers and governments.

Australia

KANE FRAMPTON[1]

Introduction

Australia's organic industry has been challenged by manifold factors in recent years, including disruptions caused by the global pandemic, natural disasters, as well as global inflation and its flow-on effects. Despite this, the industry remains robust with new certified operators regularly entering the market, and positive consumer sentiment noted (as outlined in below section on "Organic consumption and pricing trends".

As a nation, Australia possesses the world's largest area of agricultural land under certified organic management, with the majority of Australia's organic farmland dedicated to pastoral operations. Key production areas include fruit and vegetables, meat and livestock fodder, while manufacturers and processors are largely involved in fruit, vegetable and dairy products.

Recent estimates place the value of the Australian organic industry in excess of 2 billion Australian dollars.[2] 2022 has seen organic operators work through a variety of external challenges, including supply chain and logistical disruption in the aftermath of the COVID-19 pandemic. For primary organic producers in particular, the unpredictability of Australia's natural environment has once again presented major hurdles to overcome.

Natural disasters and biosecurity concerns

Natural disasters and their associated impacts have been a consistent presence for many agriculture operators in recent years, perhaps most notably with the catastrophic 2019-2020 "Black Summer" bushfire season, which saw fires burning across 24 million hectares.[3] While periods of prolonged drought and increased bushfire risk are common in Australia's climate, it was flooding events that caused widespread damage during 2022.

In 2022, Australia's east coast endured one of the nation's worst flood disasters on record, with Queensland and New South Wales battered by a series of floods from 23 February to 7 April. Twenty-two lives were lost and a total insurance bill exceeding 5.5

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[1] Kane Frampton, Marketing Coordinator, Australian Organic Limited, Nundah, Australia, www.austorganic.com

[2] Australian Organic Limited (2021) Australian Organic Market Report 2021. Australian Organic Limited, Nundah, QLD, Australia, www.austorganic.com

[3] Humphries, A (2022) "Australia's Black Summer bushfires were catastrophic enough. Now scientists say they caused a "deep, long-lived" hole in the ozone layer", ABC News, available online at https://www.abc.net.au/news/2022-08-26/black-summer-bushfires-caused-ozone-hole/101376644

billion Australian dollars has been recorded.[1] Many organic primary producers saw their businesses decimated by significant stock and crop loss, with properties inundated and machinery ruined. Given uncertainty around future rain and growing potential, some organic operators chose to opt out of their growing seasons once concurrent supply chain issues were taken into account.

A third La Nińa event[2] was declared later in 2022, with major flooding also recorded further south in New South Wales, Victoria and Tasmania during September and October, once again impacting many organic businesses. November saw major flooding in parts of South Australia. The Bureau of Meteorology has projected that La Nińa may start to ease in early 2023, which would be welcome relief for organic operators looking to plan ahead with confidence[3].

Biosecurity concerns were renewed in Australia in 2022, with Foot and Mouth Disease (FMD) and Lumpy Skin Disease (LSD) both detected in countries near to Australia. An FMD outbreak was reported in cattle in Indonesia during May 2022, later spreading to Bali, while an LSD outbreak was officially reported by Indonesia in March 2022, with the disease found on the island of Sumatra and in Singapore.

As of December 2022, there have been no reported incursions of either disease in Australia. Given the importance of organic and conventional livestock sectors in both domestic and export markets, emphasis has been placed on maintaining sound on-farm biosecurity practices. As Australia is an island nation, pre-emptive measures are needed offshore, at the border and onshore to mitigate risk. The Department of Agriculture, Fisheries and Forestry released an inaugural "National Biosecurity Strategy" in August 2022, in an effort to provide strong and clear guidelines for the next decade and beyond[4].

Organic consumption and pricing trends

A research project was conducted by Mobium Group on behalf of peak body Australian Organic Limited (AOL) in June 2022, uncovering key insights on shopping habits related to organics[5]. A total of 1'020 Australian food shoppers aged between 18 and 69 were surveyed to ascertain the level of trust that shoppers have in organic claims, a persistent barrier to consumption based on previous research.

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[1] InsuranceNews.com.au (2022) "March flood costs pass $5 billion, overtake Cyclone Tracy", available online at https://www.insurancenews.com.au/daily/march-flood-costs-pass-5-billion-overtake-cyclone-tracy

[2] A third period of the La Niña weather phenomenon was declared later in 2022. Periods of La Niña typically result in increased rainfall across much of Australia, and major flooding was recorded further south in New South Wales, Victoria and Tasmania during September and October, once again impacting many organic businesses.

[3] Australian Government Bureau of Meteorology (2022) "Negative Indian Ocean Dipole near its end; La Nina to continue into summer", accessed online at http://www.bom.gov.au/climate/enso/#tabs=Overview

[4] Watt, M (2022) "Inaugural National Biosecurity Strategy released", Australian Government Department of Agriculture, Fisheries and Forestry, available online at https://minister.agriculture.gov.au/watt/media-releases/national-biosecurity-strategy

[5] Australian Organic Limited (2022) Australian Organic Consumer Trust Survey 2022. Australian Organic Limited, Nundah, QLD, Australia, www.austorganic.com.

Perhaps the most noteworthy finding from the study was that 85 percent of food shoppers consider price/value to be an impediment to purchasing organic in 2022, as compared to 64 per cent of shoppers in 2021 and 63 per cent in 2019. This could be attributed to a deteriorating general economic climate in Australia increasing sensitivity to organic pricing.

This 2022 research also encompassed a "shopping basket pricing review" of certified organic food and beverage products from major retailers Woolworths, Coles and Harris Farm, with standard (not special) pricing captured. An average price premium of 32 per cent was noted for certified organic options compared to their conventional equivalent. In several cases, the certified organic option was found to be cheaper for products such as apple juice, soy milk and tea bags.

Positively, the latest report shows that significant progress has been made in rectifying long-held consumer "barriers to purchase" in the organic space. The 2022 study found that only 15 per cent of respondents believe **organic product access** is an issue in 2022, down from 50 per cent in a related 2010 study. Moreover, the "mainstreaming" of organics has progressed significantly during this 12-year period, with widespread adoption among major retailers in Australia.

In the same vein, only 20 per cent of 2022 respondents believe **access to organic information** is an issue, compared to 39 per cent in the 2010 study. This could be attributable to proactive campaigns led by brands and retailers seeking to inform and inspire and national awareness programs, such as the annual "Australian Organic Awareness Month" initiative spearheaded by industry peak body AOL. **Organic product quality** is also improving in the eyes of consumers, with 24 per cent indicating quality is a roadblock in 2022, reduced from 46 per cent in the 2010 study.

Given Australia's current lack of a domestic regulatory framework for organics (explored below), the presence of verified certification marks on organic products is particularly important. The 2022 study found that 88 per cent of Australian food shoppers believe that "having a certification logo to show that an organic product has been independently verified would assist in making an informed purchasing decision".

While some progress has evidently been made in eroding barriers to purchase for prospective organic shoppers, an industry-wide collaborative approach is needed to address further challenges. A key component of the Australian industry's future lies in domestic regulatory control for use of the term organic on product claims.

Pursuit of domestic regulation for organics

As of 2022, Australia remains one of the few developed nations in the world not to have implemented a domestic regulatory standard for the production and sale of organic products. This is despite industry and cross-political support for the introduction of legislation based on the current issues that Australian organic operators have in accessing international markets and establishing credibility among consumers. At present, Australian organic businesses selling domestically may voluntarily opt to become certified by one of six approved organic certification bodies, in an effort to build

consumer confidence. Certification is only compulsory for businesses wishing to export.

Proponents of a domestic regulatory instrument believe that it will help to grow market access internationally, simplify the negotiation of equivalency agreements, and improve consumer confidence around organic product claims. Some Australian organic exporters are forced to pay separate and additional certification fees at present, depending on the requirements of destinations they are exporting to.

The introduction of domestic regulation appears to be moving closer, with the progress made in recent years. An Organic Industry Advisory Group (OIAG) was established in December 2020 by then federal Agriculture Minister David Littleproud, with an appointed group of cross-sectional industry stakeholders meeting during 2021 to "provide advice and facilitate broad consultation"[1]. Once OIAG submissions were received, the Minister commenced a Consultation Regulation Impact Statement (RIS) process in early 2022, where feedback was sought from businesses and individuals across the organics sector to gauge the full scale of potential regulatory impacts. Two tranches of public engagement were concluded in March 2022.

The Labor party won Australia's May 2022 federal election, ousting the Liberal-National Coalition and leading to a pause in proceedings as the new Department of Agriculture, Fisheries and Forestry took shape. Much of their focus following the election was on pressing matters related to flooding and biosecurity, but the industry managed to re-engage the organic discussion with the Department and new Minister for Agriculture Murray Watt later in 2022. The Department has expressed support for the implementation of a domestic standard, but it will take some time for the finer points of the proposed legislation to be explicated. Australian Organic Limited (AOL) is committed to working closely with the Government and Industry in any necessary capacity to help deliver a fit-for-purpose regulatory structure as soon as possible.

[1] Australian Government Department of Agriculture, Fisheries and Forestry (2022) "Organic and biodynamic produce – Consultation on domestic organics regulation", available online at https://www.agriculture.gov.au/agriculture-land/farm-food-drought/food/organic-biodynamic/organic-industry-advisory-group#what-is-the-current-state-of-domestic-organics-regulation

A Snapshot of Organics in Aotearoa New Zealand[1]

TIFFANY TOMPKINS[2]

Organic agriculture is a fast-growing sector in Aotearoa New Zealand. It is well placed to continue to not only leverage the country's clean, green reputation but is an increasingly important pillar in telling Aotearoa's story to international consumers.

The New Zealand organic market

Valued at 723 million NZ dollars in 2020[3], sector growth comes from a position of strength and untapped potential. The organic sector generates approximately a total of 623 million NZ dollars in export (420 million NZ dollars; 58 percent of total) and domestic market revenue (302 million NZ dollars, 42 percent), with a further 100 million NZ dollars worth of products imported into New Zealand to meet consumer demand. The average annual growth rate for organics at 6.4 percent over the past three years is quite substantial as it was achieved without government incentives or supporting policy frameworks (Table 97).

Table 97: New Zealand's organic market – key data

	2020	Growth since 2017
Total market	723 Million NZ dollars	+20% (annual growth rate: 6.4%)
• **Exports**	420.2 million NZ dollars	+18%
• **Domestic market**	302.5 million NZ dollars	+23%
• **Imports**	100 Million NZ dollars	

Source: Organics Aotearoa New Zealand (OANZ) 2022

From just 86'000 hectares under organic certification, the average earnings are about 7250 NZ dollars per hectare – responding to consumer demand for organic products, particularly organic dairy, wine and kiwifruit. The sector exports to many global markets, including those in emerging economies where a rising middle class is using their new economic power to buy better food for their families.

There are many ways in which the sector can respond to the opportunities and challenges it faces. Following the principles of organics, the health of the environment and of people will always be integral to business. For the organic sector, how it grows is as important as growth itself. Sector growth enriches our whenua (lands) and our

[1] This article represents a Summary of the New Zealand Organic Sector Market Report 2022/21. For more information see https://www.oanz.org/market-reports.

2 Tiffani Tompkins, CEO, Organics Aotearoa New Zealand (OANZ), P O Box 78408, Grey Lynn, Auckland 1245, New Zealand, www.oanz.org

3 In 2020, 1 Euro corresponded to 1.7561 New Zealand dollars.

hapori (communities) as much as producers, brand owners, exporters and others engaged in the organic community.

Consumers

Most New Zealanders purchase organic products at least fortnightly, the majority of these from supermarkets. However, sales through other channels, including food service, tripled between 2017 and 2020. As organic becomes more mainstream, this channel is expected to continue to grow and diversify (Figure 107).

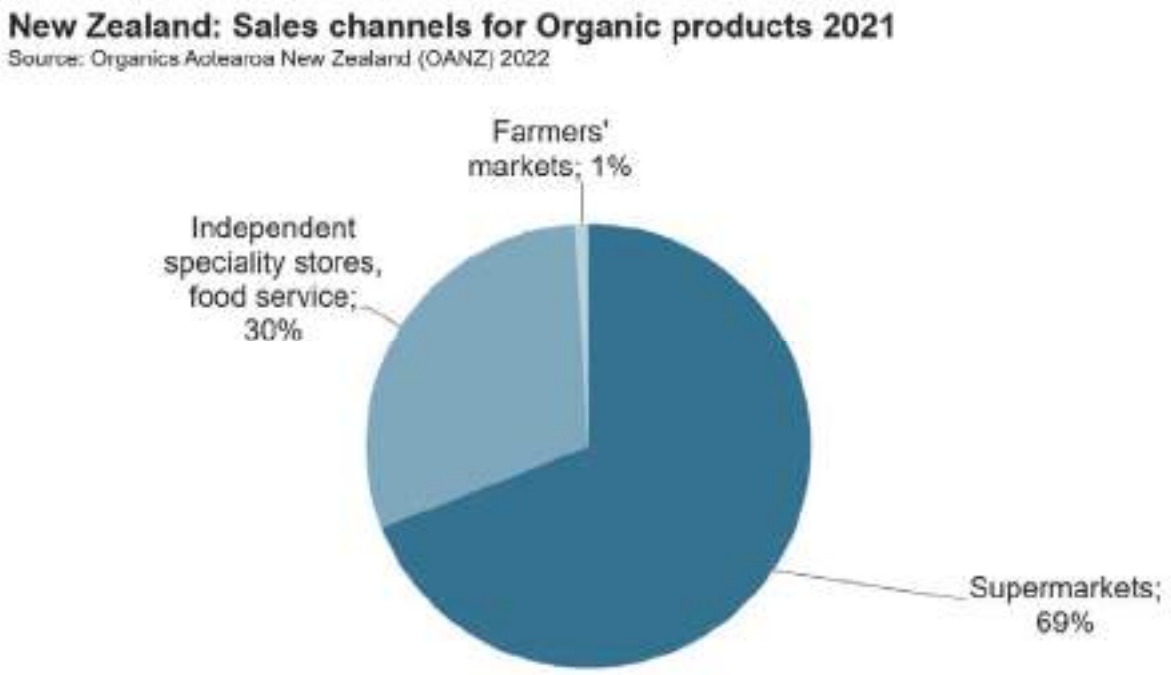


Figure 107: New Zealand: Sales channels for Organic products 2021

Source: Organics Aotearoa New Zealand (OANZ) 2022

It is estimated that imported certified organic products comprise approximately 30 percent of the domestic market; typically, these are products New Zealand does not grow.

The OANZ market report found that 81 percent of New Zealanders surveyed, reported purchasing organic products at least fortnightly. By product group the pretences were as follows.

- 41 percent by organic fruit and vegetables
- 38 percent by meat, poultry, fish or eggs
- 29 percent buy dairy products
- 25 percent by packaged, dried or frozen organic goods.

The main drivers for purchasing organic products are: closer to nature, taste, free of residues and sprays, health (including family health), and reducing the impact on the planet. The main barriers to consumers preventing them from buying organic products are price and availability.

Organic operations

The number of certified organic operators has continued to increase, with a 9 percent growth (105 operators) since 2017. The number of certified operations increased by 198 in the same period, up 12 percent. There are over 300 operations in horticulture, followed by viticulture and dairy at around 200 and 100, respectively. There are approximately 350 certified organic processors (across all sectors). There has been a 54 percent increase in operations under conversion to organic compared to 2017.

Table 98: Development of the number of organic operators and operations 1997-2020

	1997	2007	2009	2012	2015	2017	2020
Certified operators	335	860	1145	1221	997	1118	1223
Certified operations		1206	1416	1765	1500	1672	1870
Operations under conversion				232	104	141	217

Source: Organics Aotearoa New Zealand (OANZ)

New Zealand's Organic Export Markets

New Zealand has an excellent international reputation for its natural environment and, consequently, a reputation for producing safe, clean and green products.

Since 2017, New Zealand's organic exports have grown by 18 percent to reach a value of 420 million NZ dollars in 2020, up from 356 million NZ dollars in 2017. While growth was experienced across almost all markets and product categories, three stand-out sectors dominate organic production.

- Organic dairy is the largest organic sector, with exports of 153.8 million NZ dollars, up 55 percent from 2017.
- Fruit and vegetables are the second largest sector at 143 million NZ dollars, up 6 percent from 2017.
- The wine sector is third at 65 million NZ dollars, up 40 percent from 2017.

Organic Exports by Destination

New Zealand is the only country that exports the majority of its organic production - at around 58 percent. By contrast, Australia exports 26 percent, Denmark 19 percent, Sweden 10 percent and the US less than 2 percent.

Table 99: New Zealand's top 5 organic export markets

Destination	Exports in NZ dollars	Share of all organic exports
USA	86.8 million	20.5%
China	81.8 million	19.5%
European Union	73.4 million	17.5%
Australia	66.4 million	15.8%
Japan	31.5 million	7.5%

Source: Organics Aotearoa New Zealand (OANZ)

China only recently became a significant organic export destination for New Zealand in 2020. Liquid milk and organic infant formula are important organic dairy products in China. This growth has been assisted by new Chinese government environmental policies and standards around organics in 2019 when the government tightened regulations regarding what products can be called 'organic'.

In addition, the demand for New Zealand dairy is attributed to Chinese concerns over local food safety and quality, which has been validated by instances of large-scale food adulteration. Rapid urbanisation, a growing middle-class with higher disposable income, and Chinese consumers' high regard for New Zealand products also contribute to the success of dairy sales. (Consumer study from the Ministry for Primary Industries (MPI) found that 85 percent of Chinese consumers rated New Zealand as a leading supplier of high-quality produce.)

New Zealand has been an early mover in trade with China and is the fifth-largest supplier of organic products to China.

Exports to the USA are dominated by fresh fruit, dairy and wine. Globally, the USA is the biggest consumer of organic meat and vegetables and the largest single consumer of organic products.

COVID-19's Influence

Through the COVID pandemic, New Zealand's food and beverage image has provided a global opportunity for the country. According to New Zealand Trade and Enterprise (NZTE) research on how COVID has shifted consumer behaviour and perceptions in New Zealand's major markets, COVID has amplified consumer interest in food safety and quality.

Consumer insights revealed that "safety" and "high quality" are the main drivers for trust in New Zealand products. Consumer insights also show that there is a growing demand for more natural products that focus on health.

The presence of COVID-19 in the community, in the news and in everyday conversations significantly impacted consumers. It interrupted the purchasing and consumption of products through its impact on the incomes of some households and by leading people to rethink what they were doing.

One major trend that resulted was that people's consideration of their health and their family's health was heightened in the pandemic environment. This led to a rise in the sales of organic purchases, but with an uneven impact across the market where the dynamics of price, frequency of store visits and basket size shifted.

Financially constrained households on lower incomes continued to shop in price-orientated supermarket chains. Financially insulated households with higher disposable incomes, while still weighted to price-orientated supermarkets, had a higher share in range-orientated supermarkets and independent stores. The households whose incomes were constrained by the pandemic were spread across the socio-economic spectrum. They changed the most, as the pandemic and its impact on their circumstances led them to rethink their lifestyles.

Prior to the pandemic, purchasing and consumption trends were towards products containing less sugar, salt and fat, together with diets that contained a healthier balance of foods and with a trend toward plant-based diets. While the majority (72 percent) of people haven't changed their diet much, 18 percent of constrained households reported eating more healthily.

Their responses aligned with the pandemic trends of consumers eating more healthily, with 77 percent of constrained households reporting higher intakes of fruit and vegetables compared to the 71 percent response rate of insulated households. Both groups reported eating less processed foods (57 percent for insulated families versus 54 percent for constrained) and preparing healthier food at home (64 percent for constrained and 63 percent for insulated). Both sets of households were on par (at 12 percent for constrained and 12.9 percent for insulated) when it came to following specific diets or healthy eating plans.

Indigenous Māori Organics in Aotearoa New Zealand

The National Māori Organics Authority of Aotearoa (Te Waka Kai Ora, TWKO) makes a strong contribution to Māori organics through its presence and through continuing support for Māori organic growers at the Social Enterprise Enablers Network "flaxroots".[1] 2019/2020 has seen a refresh of TWKO with the election of a new Executive - Dr Jessica Hutchings -, the launching of a new website and a review of the Hua Parakore[2] documentation.

There are constant enquiries from Māori growers, trusts and farmers being made on a weekly basis regarding the Hua Parakore system. A key activity in 2020 was engagement with the Crown[3] on the Organic Products Bill and the call for a Treaty-based approach by the Ministry for Primary Industries (MPI) to organics in Aotearoa New Zealand. TWKO continues to build partnerships across the organics sector with Organics Aotearoa New Zealand (OANZ) and the Soil and Health Association as well as with kaupapa Māori organisations[4] such as Te Aho Tū Roa[5] and the Toimata Foundation[6].

Tahuri Whenua Inc. also formed in the early 2000s, as a National Māori Vegetable Growers Collective with a strong emphasis on indigenous and organic production

[1] Flaxroots is the Social Enterprise Enablers Network of Aotearoa, New Zealand. More information can be found at https://flaxroots.nz/

[2] Hua parakore is an indigenous food sovereignty initiative and hallmark of excellence for food and product production. More information can be found at https://www.journal.mai.ac.nz/content/hua-parakore-indigenous-food-sovereignty-initiative-and-hallmark-excellence-food-and-product.

[3] In New Zealand, the Crown describes executive government conducted by Ministers and their departments. It does not normally include organisations having their own corporate identities, such as state-owned enterprises. More information is available at https://dpmc.govt.nz/our-business-units/cabinet-office/supporting-work-cabinet/cabinet-manual/1-sovereign-governor-1

[4] Kura Kaupapa Māori are Māori-language immersion schools (kura) in New Zealand where the philosophy and practice reflect Māori cultural values with the aim of revitalising Māori language, knowledge and culture. For more information see https://en.wikipedia.org/wiki/Kura_Kaupapa_M percentC4%81ori.

[5] For more information see https://www.teahoturoa.org.nz/

[6] For more information see https://toimata.org.nz/

systems. Tuku Māori Winemakers Collective promote sustainability and intergenerational cultural values in their collective. Regional or local groups such as the Ngāti Porou Miere (honey) Collective promote sustainability including organic principles in their activities and support of members.

Our research has identified that while the certified organic base for Māori is small, there is clear alignment in values between tikanga Māori and organics.

It is also clear that Māori are world leaders in developing and organising indigenous verification systems that can embellish the organic story, and are apt at developing organisational structures and visions to meet future needs. Māori also remain open in sharing these methods and processes with other people who support these cultural processes, nationally and internationally.

The relationship between traditional inputs and organic production for Māori is well recognised, but not yet well supported through research activity aligned to traditional production systems.

Investment in the development of sustainable "Māori organics" through research, infrastructure and support systems would be a valuable addition to building Māori capacity and outputs relative to land management and production systems generally.

The Pacific Islands

KAREN MAPUSUA[1]

Recent developments

COVID-19, including supply chain disruptions, restrictions on mobility and border closures, continued to substantially impact organic farmers, supply chains and certification across the Pacific Islands. Audit and inspections have been severely impacted as few countries have nationally based inspectors; they fly in from neighbouring regions of Australia, New Zealand or South East Asia, and even the United States. Most Pacific island states' national borders did not open until the 3rd quarter of 2022. Some licensees have been able to undertake virtual audits, which has meant that no new farms or licensees have been able to take up certification. However, governments continue to take action to create a supportive policy environment, the demand for certification continues, and regional and national agencies and development partners are increasingly recognising the value of organic agriculture as a development tool for the Pacific islands context.

In 2020 the Pacific Organic and Ethical Trade Community (POETCom) surveyed organic producers to assess the impact of COVID-19 on their production and livelihoods, finding that farmers had difficulty accessing markets. Village-level income sources are lost due to increasing unemployment among community members, especially in Fiji. Inter-island supply chain logistics have been significantly affected during lockdown periods, and some farmers were unable to access inputs. Domestic sales dropped dramatically due to the lack of tourists, while regional and international sales have diminished due to border closures. Respondents also noted that even though auditors cannot travel, accreditors insist on continued surveillance. The main causes of farmers not being able to access their farms were travel restrictions (including inter-island travel, controls on travel in and out of some cities), lockdowns and government recommendations to stay at home. There has been, however, an increase in demand for locally made organic approved inputs as people are now more attuned to the importance of agriculture and are turning to gardening (at least for home consumption).

Market, trade and certification

As most of the organically certified products from the Pacific are for export, the pandemic has forced producers to seek to expand local market opportunities giving impetus to the trend of previous years of growing local markets through basket (box) schemes, unverified organic claims on labels, PGS development, organic stalls at farmers markets, and increased awareness.

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[1] Karen Mapusua, Director Land Resources Division, Pacific Community (SPC) and President of IFOAM - Organics International, Suva, Fiji

The following is a summary table listing the main products that are currently organically certified in the Pacific:

Table 100: Pacific Islands/Oceania: Main products from the Pacific Islands

Products	Countries
Vanilla, turmeric, ginger & other spices	Fiji, Vanuatu, Niue, Samoa
Cocoa	Vanuatu, Samoa, PNG
Virgin Coconut Oil	Samoa, Fiji, Solomon Islands, Tonga, Vanuatu
Coconut meal	Vanuatu
Nonu /noni (Morinda Citrifolia)	Cook Islands, Samoa, Fiji, Niue, French Polynesia
Honey	Niue, Fiji
Bananas (including processed)	PNG, Samoa
Coffee	PNG, Samoa, Vanuatu
Livestock(Beef, Goats and Sheep)	Vanuatu, Fiji
Fruit & Vegetables (including processed)	Fiji, New Caledonia, Samoa, French Polynesia, Cook Islands, Republic of the Marshall Islands
Rum	French Polynesia
Forest nuts	Solomon Islands

As yet, there are no mechanisms for collecting local organic market data. Still, growth can be inferred from the growth in PGS-certified farms and the number of organic value chains and market opportunities. The Government of Vanuatu is investigating the possibility of collecting agricultural data supported by artificial intelligence as is currently utilised in the fisheries sector. If successful, it could benefit from gathering this information for the organic sector.

PGS models in the Pacific include wild harvest, 'whole island', as well as more traditional grower groups. Respect for traditional authorities (chiefs) is strong in the Pacific Islands, and in some cases, traditional governance systems have been embraced to provide support to the guarantee system. Processing and value-adding operations are also certified through the PGS process. This has created a need to provide considerable upskilling to those PGS who include processing to manage the more complex inspection requirements.

In 2021 there were 12 PGS approved to use the Organic Pasifika Mark, with five additional PGS under development. The number and variety of PGS-certified products on local markets and for export is expanding, and 2021 saw the range grow to include value-added products such as tofu. The growth of PGS and improved recognition of the value of organics has also contributed to a rise in farmers' markets and supply agreements. Samoa, Niue, Cook Islands and Fiji now have certified produce sold through farmers' markets. The Republic of the Marshall Islands has small amounts of certified fresh produce available in selected supermarkets. Fiji also has 135 PGS-certified farmers supplying vegetables to the country's only organic restaurant Tukuni, established by the Foundation for Rural Enterprises and Development (FRIEND). The hotel chain Marriot has expressed strong interest in this model for supplying its resort in Fiji, including the restaurant concept, focusing on traditional dishes and crops. Discussions are ongoing with FRIEND on cooperation models. These markets all

suffered varying degrees of disruption due to local travel and health restrictions but have maintained momentum and picked up again once restrictions were eased.

Third-party organic certification suffered a greater impact due to the unavailability of inspectors at the national level, combined with supply chain disruptions. Most Pacific Islands maintained tight border closures till the mid to 3rd quarter of 2022. In addition, the associated loss of markets has resulted in some licensees losing certification and others needing help to undergo first inspections to start the certification process.

Legislation

New Caledonia and French Polynesia remain the only Territories to have regulated organics. Independent countries of the region still need to pass organic regulations. The Government of Vanuatu has endorsed its first national organic policy, and the Governments of Palau and Fiji now have draft policy's waiting for official endorsement by authorities.

Government and international (development) support

As a regional intergovernmental organisation, the Pacific Community continues to support organics development and houses the POETCom secretariat. POETCom remains predominantly funded through development projects.

POETCom national affiliates continue to receive assistance from international NGOs and through bilateral development assistance. In a few cases, national governments provide financial support for organic certification costs, as in the case of Samoa and Niue, where the national governments cover certification fees for national grower groups.

The growing interest of development partners in organics as a solution for climate reliance and livelihood development is demonstrated through the Building Prosperity for Women Producers through Organic Value Chains (BWBP) project launched in 2018 and concluded in 2023. It is implemented in partnership with the Pacific Community (SPC), Pacific Organic & Ethical Trade Community (POETCom) and the Australian Department of Foreign Affairs and Trade (DFAT). The Australian-funded Pacific Women programme recognised the potential for organic value chains and mechanisms such as Participatory Guarantee Systems (PGS) to economically and socially empower women and worked with POETCom to design the project that will work with organic producers, processors, vendors and organic associations and focus on niche organic products that women can develop.

Another example is the PROTÉGÉ project in the Pacific French Territories, funded by the European Union. PROTÉGÉ stands for "Projet régional océanien des territoires pour la gestion durable des écosystèmes" (Pacific Territories Regional Project for Sustainable Ecosystem Management) and has the objective to strengthen the sustainability, climate change adaptation and autonomy of key sectors; and enhance ecosystem-services by protecting water resources and biodiversity. Agroecology and organic agriculture form the basis of the agriculture component of the programme.

Outlook

A review was undertaken into POETCom's structure to design a sustainable funding mechanism to support the organic movement and the Pacific Organic Guarantee Scheme. Recommendations are being finalised.

Opportunities for scaling organics as a response to climate change are growing, with development partners more interested in funding programmes of this nature.

There are opportunities as post-COVID Pacific economies plan for a green recovery, and an expectation that the local market for organic products will continue expansion as tourism and hospitality industries look towards organic and sustainability as part of the Pacific islands brand. This is being hampered by the economic situation, and while tourism recovery has been strong, visitors to the Pacific are looking for 'budget' holidays, and organic may struggle to find its place in this narrative.

Links/Further reading

Pacific Organic and Ethical Trade Community www.organicpasifika.com
POETCom COVID-19 Survey report https://www.organicpasifika.com/poetcom/wp-content/uploads/2022/12/COVID19-Survey-Report_POETCom.pdf
Pacific Organic Standard, http://www.organicpasifika.com/poetcom/wp-content/uploads/2021/07/POS.pdf
POETCom Strategic Plan http://www.organicpasifika.com/poetcom/wp-content/uploads/2020/12/POETCom_Strategic_PlanEnglish_Final_e-copy.pdf
POETCom Annual Reports http://www.organicpasifika.com/poetcom/who-are-we/annual-reports/
Pacific Organic Policy Toolkit http://www.organicpasifika.com/pasifikapolicytoolkit/

Organic Agriculture in Oceania: Key Facts and Figures

JAN TRÁVNÍČEK[1], BERNHARD SCHLATTER[2] AND HELGA WILLER[3]

Nearly 36 million hectares of farmland were organic in Oceania in 2021 – Australia had the largest area worldwide.

In Oceania, nearly 36 million hectares of farmland were managed organically in 2021. Over 47 percent of the world's organic farmland was in Oceania.

With almost 35'688'000 hectares, the country that had the largest area of farmland under organic management in 2021 was Australia, followed by Papua New Guinea (over 88'000 hectares), Samoa (over 82'000 hectares) and New Zealand (over 79'000 hectares). More than 99 percent of Oceania's organic farmland was in Australia.

Samoa is the country with the highest organic area share in Oceania.

Organic farmland in Oceania constituted 9.7 percent of the total agricultural land of the continent, which was below the global share (1.6 percent) in 2021.

The country with the highest organic area share was Samoa (29.1 percent), which was followed by Australia (9.9 percent) and Papua New Guinea (7.4 percent).

Oceania's organic farmland increased by almost 77'000 hectares.

Oceania's organic farmland increased by almost 77'000 hectares, or about 0.2 percent, from 2020 to 2021. From 2012 to 2021, Oceania's organic farmland grew by 217 percent and thus at a much faster rate than global organic farmland, mainly due to major increases in Australia.

The key crops grown are coffee, coconuts and cereals.

More than 96 percent (over 34'672'000 hectares) of organic farmland in Oceania is permanent grassland or grazing land, mainly in Australia. Not much information is available on the use of arable land and permanent cropland.

Only a small fraction of the organic farmland (51'386 hectares) is for arable crops. The key arable crop group in 2021 was cereals (41'293 hectares). Permanent crops accounted for approximately 0.4 percent of the total organic farmland in Oceania. Among the key crops were coffee (68'238 hectares), coconuts (48'226 hectares) and grapes (5'783 hectares)..

Organic producers, processors and importers: 18'479 producers managing nearly 36 million hectares

There were more than 18'000 organic producers in Oceania, with the highest numbers in Papua New Guinea (12'827). Only 0.5 percent of the world's organic producers were

[1] Jan Trávníček, Czech Organics, Staré Město, Czech Republic, www.czechorganics.com
[2] Bernhard Schlatter, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org
[3] Dr. Helga Willer, Research Institute of Organic Agriculture FiBL, Frick, Switzerland, www.fibl.org

in Oceania. Compared to 2020, 3'826 more (26 percent increase) organic producers were counted. A total of 421 exporters and 2'424 processers were counted.

Retail sales: Data available for Australia and New Zealand

The total organic retail sales in Australia and New Zealand reached more than 1'866 million euros in 2021. In the two countries, per capita consumption of organic food products reached almost 58.7 euros per person per year in 2021.

Organic exports – almost 30'000 metric tons

Data on organic export volumes in metric tons to the European Union has been available since 2018, and data on exports to the US has been available since 2014. Data show that in 2021 over 34'171 metric tons of products were exported from Oceania to the EU and US, constituting 0.7 percent of all organic exports to these countries/trade blocks. In the four-year period from 2018 to 2021, exports from Oceania increased by almost 18 percent, considerably faster than global organic exports to the EU and US, which grew by only 5 percent in the same period.

New Zealand is the largest exporter

The largest exporter in Oceania was New Zealand (more than 29'587 metric tons of products – almost 57 percent apples and almost 30 percent kiwis), followed by Papua New Guinea (almost 2'500 metric tons, mainly coffee) and Australia (1'949 metric tons).

Apples and kiwis are the most important export product

Comprising more than 16'747 metric tons and almost two-thirds of the organic exports from Oceania, temperate fruits (exclusively apples) were the most important product group, followed by tropical and subtropical fruit (8'833 metric tons, exclusively kiwi) and coffee (2'489 metric tons.

For more information see figures and data tables on the following pages.

Organic Agriculture in Oceania: Graphs

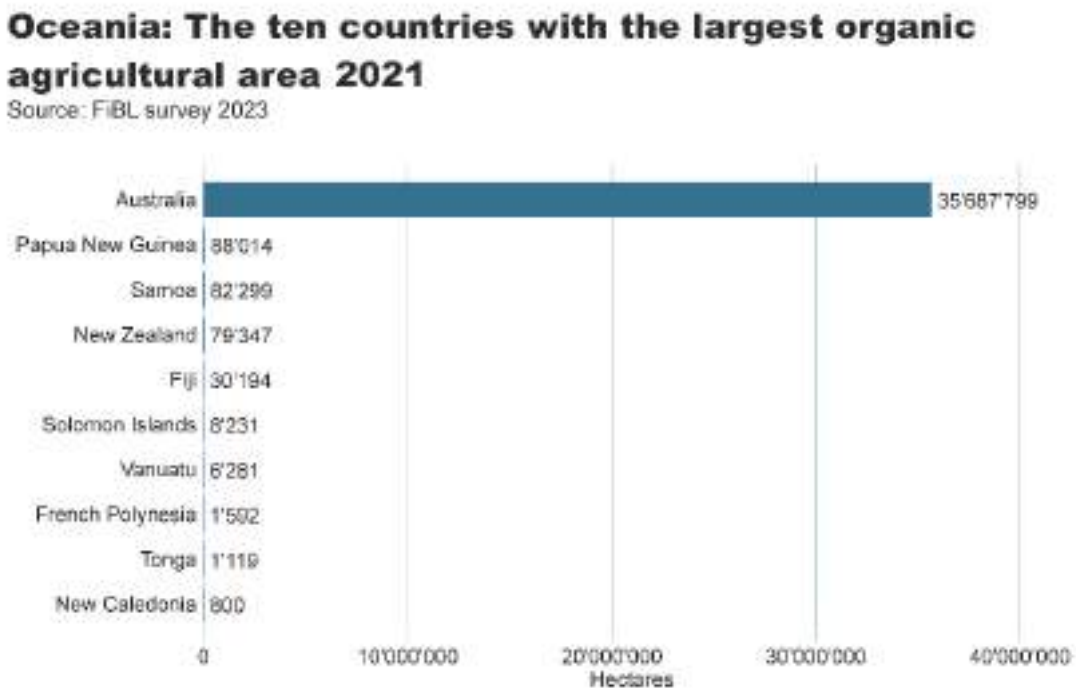


Figure 108: Oceania: The ten countries with the largest organic agricultural area 2021

Source: POETCom-FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

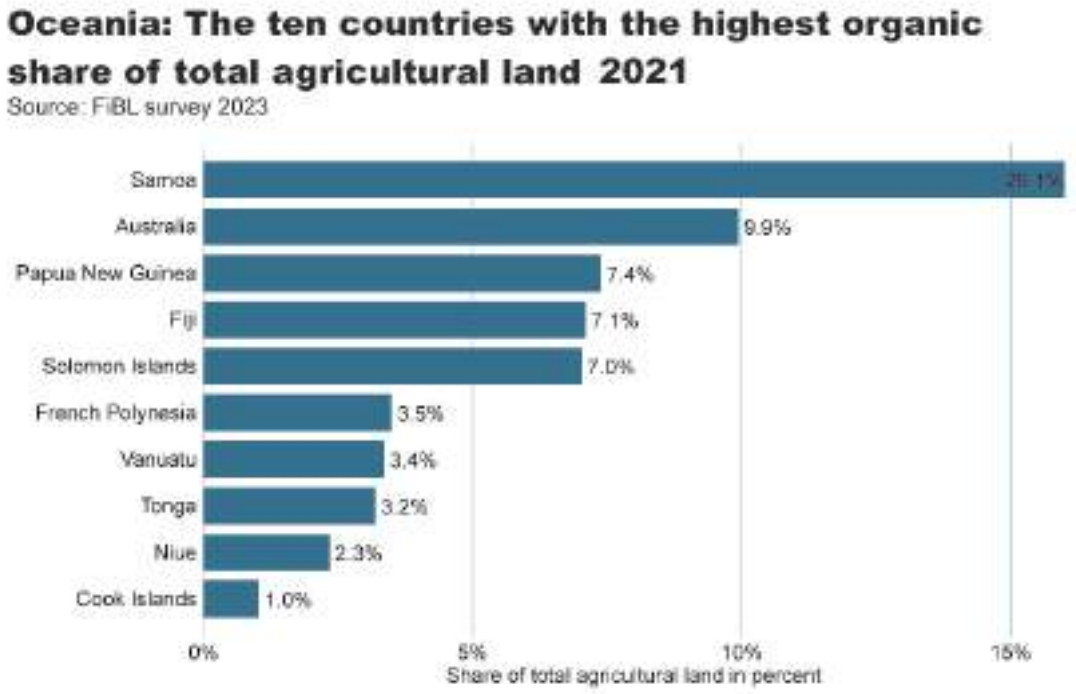


Figure 109: Oceania: The countries with the highest organic share of total agricultural land 2021

Source: POETCom-FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

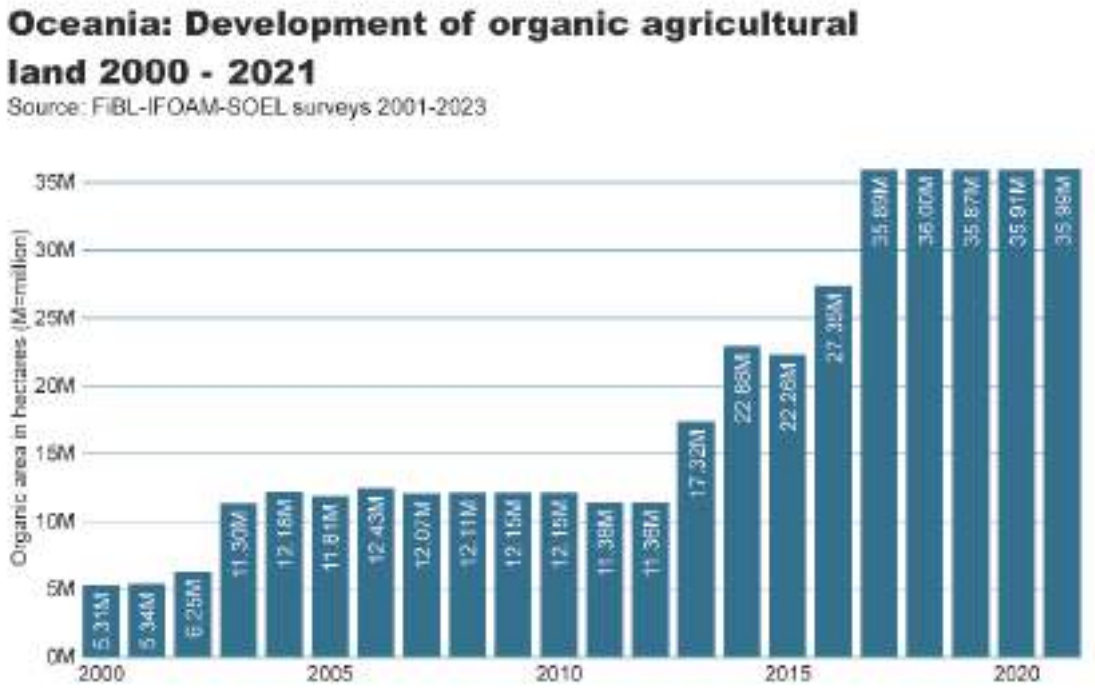


Figure 110: Oceania: Development of organic agricultural land 2000-2021

Source: POETCom-FiBL-IFOAM-SOEL-surveys 2001-2023

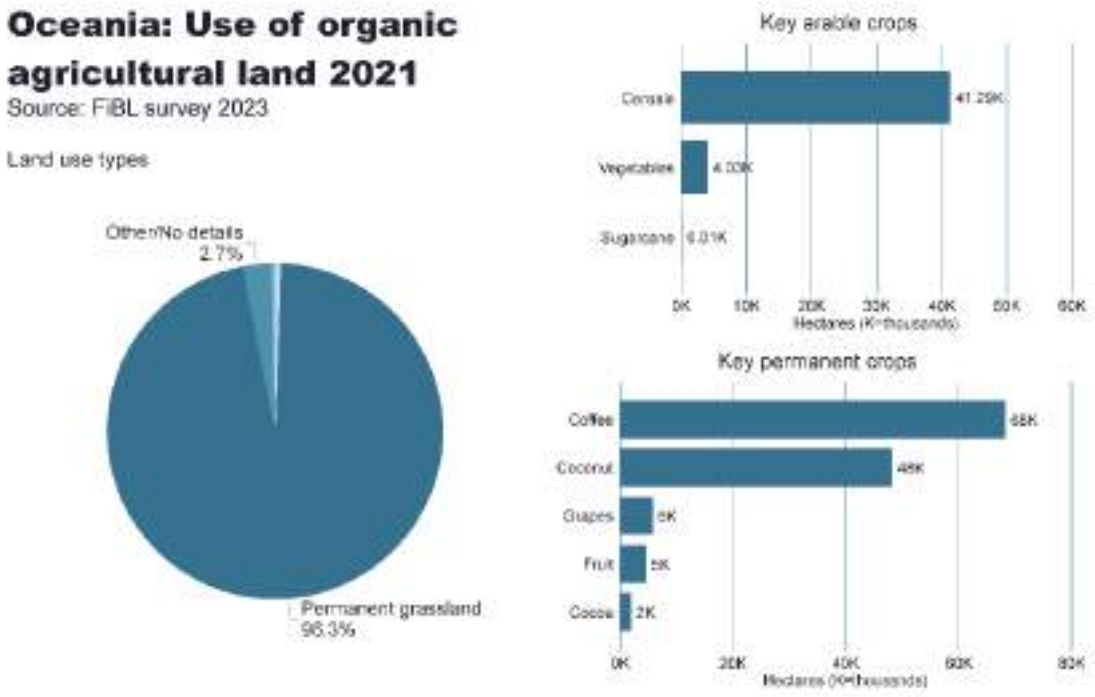


Figure 111: Oceania: Use of organic agricultural land 2021

Source: POETCom-FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

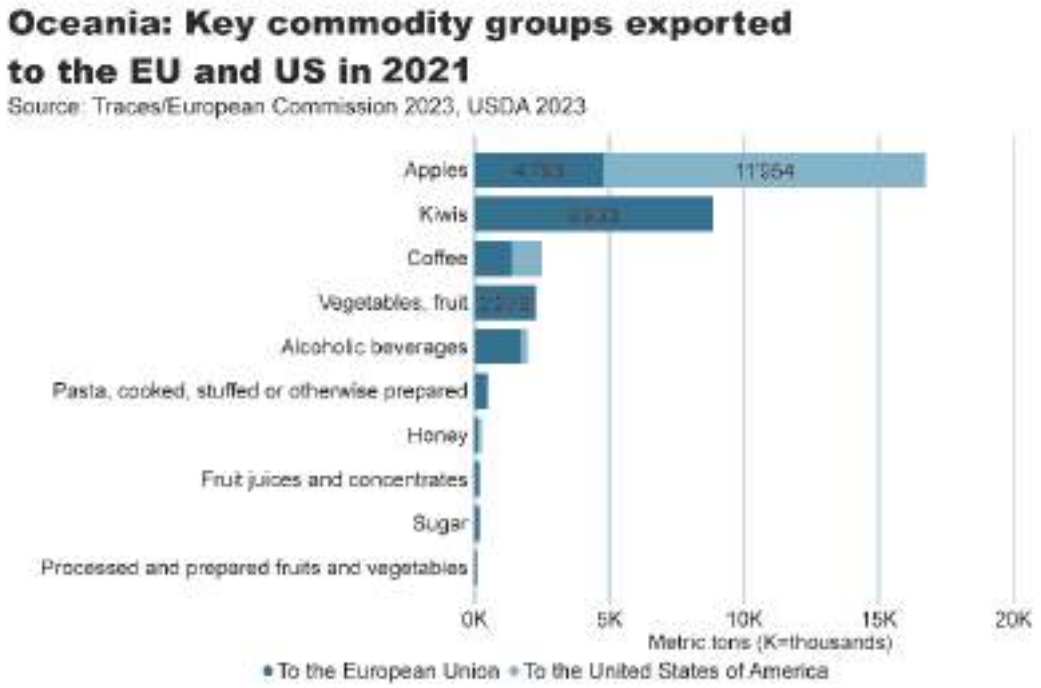


Figure 112: Oceania: Key commodity groups exported to the EU and US

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

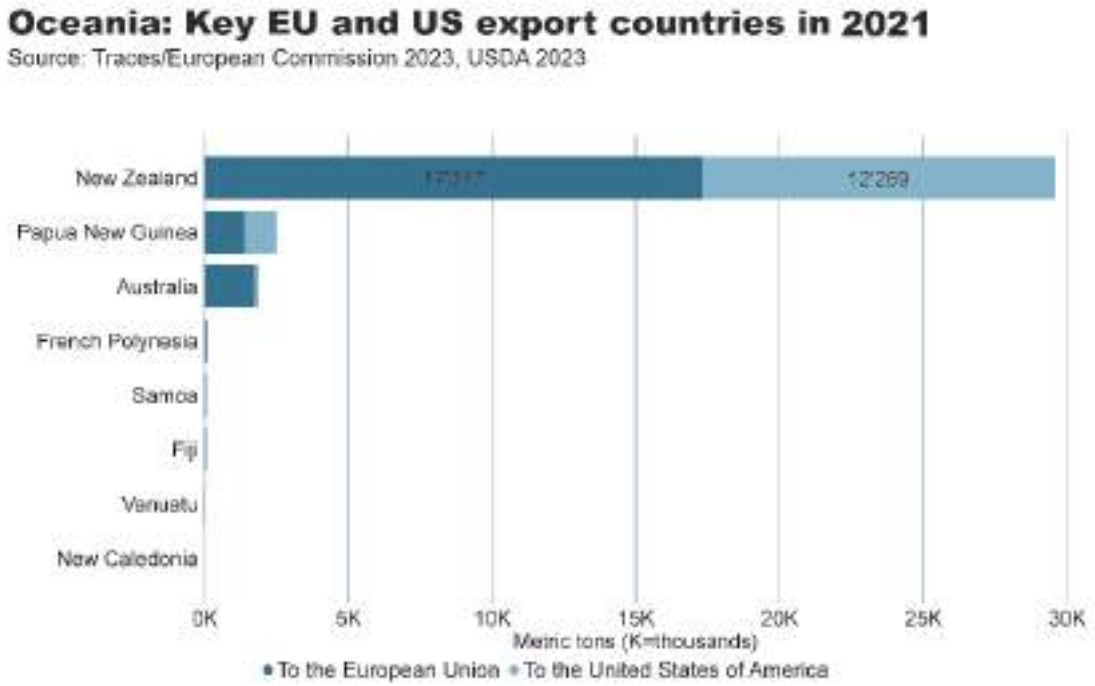


Figure 113: Oceania: Key countries exporting to the EU and US

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Organic Agriculture in Oceania: Tables

Table 101: Oceania: Organic agricultural land, organic share of total agricultural land and number of organic producers 2021

Country	Area [ha]	Share of total agri. land [%]	Producers [no.]
Australia	35'687'799	9.9%	1'829
Cook Islands	15	1.0%	58
Fiji	30'194	7.1%	13
French Polynesia	1'592	3.5%	19
New Caledonia	800	0.4%	
New Zealand	79'347	0.8%	685
Niue	117	2.3%	2
Papua New Guinea	88'014	7.4%	12'827
Samoa	82'299	29.1%	1'993
Solomon Islands	8'231	7.0%	898
Tonga	1'119	3.2%	81
Vanuatu	6'281	3.4%	74
Total	**35'985'809**	**9.7%**	**18'479**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Tables: Oceania: Land use in organic agriculture 2021

Land use	Crop group	Area [ha]
Agricultural land and crops, no details		138'460
Arable land crops	Cereals	41'293
	Fresh vegetables and melons	4'035
	Sugarcane	7
	Arable crops, no details	6'052
Arable land crops total		**51'386**
Other agricultural land		46'765
Permanent crops	Cocoa	1'935
	Coconut	48'226
	Coffee	68'238
	Fruit	4'567
	Fruit, tropical and subtropical	34
	Grapes	5'783
	Medicinal and aromatic plants, permanent	171
	Permanent crops, other	18'331
Permanent crops total		**147'284**
Permanent grassland		**34'672'149**
Total		**35'985'809**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 102: Oceania: Land use in organic agriculture 2021 by country

Country	Agricultural land, no details [ha]	Arable crops [ha]	Permanent crops [ha]	Permanent grassland [ha]	Other agricultural land [ha]
Australia	39'436	45'195	10'350	34'617'165	975'653
Cook Islands			15		
Fiji	30'194				
French Polynesia		32	1'481		80
New Caledonia	800				
New Zealand		6'052	18'311	54'984	

Country	Agricultural land, no details [ha]	Arable crops [ha]	Permanent crops [ha]	Permanent grassland [ha]	Other agricultural land [ha]
Niue	117				
Papua New Guinea	17'511		70'502		
Samoa	41'307		40'992		
Solomon Islands	4'864		3'367		
Tonga		108	215		796
Vanuatu	4'230		2'052		
Total	**138'460**	**51'386**	**147'284**	**34'672'149**	**976'530**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 103: Oceania: All organic areas 2021

Country	Agriculture [ha]	Wild collection [ha]	Total [ha]
Australia	35'687'799		35'687'799
Cook Islands	15		15
Fiji	30'194		30'194
French Polynesia	1'592	115'930	117'522
New Caledonia	800		800
New Zealand	79'347		79'347
Niue	117		117
Papua New Guinea	88'014		88'014
Samoa	82'299	5'864	88'164
Solomon Islands	8'231		8'231
Tonga	1'119		1'119
Vanuatu	6'281		6'281
Total	**35'985'809**	**121'794**	**36'107'603**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 104: Oceania: Use of wild collection areas 2021

Land use	Area [ha]
Wild collection, no details	121'794
Total	**121'794**

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 105: Oceania: Organic retail sales 2021

Country	Retail sales [Million €]	Per capita [€/person]
Australia	1'694.1	65.8
New Zealand	172.3	33.6

Source: FiBL survey 2023, based on information from the private sector, certifiers, and governments. For detailed data sources, see annex, page 338.

Table 106: Oceania: Organic exports to the EU and US by country 2021 (totals)

Country	Exports to EU and USA [MT]
New Zealand	29'587
Papua New Guinea	2'494

Country	Exports to EU and USA [MT]
Australia	1'896
French Polynesia	79
Samoa	51
Fiji	43
Vanuatu	21
New Caledonia	0.4
Total	**34'171**

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Table 107: Oceania: Organic exports to the EU and US by commodity 2021 (totals)

Country	Exports to EU and USA [MT]
Fruit of temperate climate zones	16'747
Fruit, tropical and subtropical	8'833
Coffee	2'489
Fresh vegetables and melons	2'329
Beverages	1'954
Noodles, couscous, etc.	498
Bee products	278
Fruit, berries and nuts, prepared and preserved	215
Sugar	187
Processed and prepared fruits and vegetables	134
Vegetables, prepared and preserved	89
Vegetable and animal oils and fats	81
Grapes	77
Medicinal and aromatic plants	73
Spices and aromatics	44
Non-food products	34
Other food products and product groups	27
Olives	22
Food additives	20
Medicinal and aromatic plants, permanent	14
Seeds and seedlings	10
Hops	6
Plants harvested green	2
Hot beverages (Coffee, tea and cacao etc.)	2
Tea/mate, etc.	1
Other products	1
Nuts	1
Cereals	1
Total	**34'171**

Source: GATS/USDA TRACES/European Commission. For detailed data sources, see annex, page 338.

Annex I: Key Indicators by Region and Country

As a new addition to our tables on the key indicators, we have included the combined exports to the European Union and the United States in metric tons (MT). Please note that for the U.S., not all exports are covered, only select products. Please also bear in mind that there are further export destinations, so the data shown here is not complete. For the countries of the European Union, only the exports to the USA are listed. There are no data on intra-EU trade. See also chapter in this book on EU organic imports (page 137).

Table 108: Key indicators by region 2021

Region	Organic farmland [ha]	Organic share of total farmland [%]	Organic producers [no.]	Organic retail sales [Million €]	Export to EU and USA combined [MT]
Africa*	2'663'983	0.2	1'123'255	N/A	456'805
Asia	6'504'211	0.4	1'782'133	13'747	664'470
Europe	17'844'853	3.6	442'274	54'539	671'209
Latin America	9'870'887	1.4	280'436	778	2'610'054
Northern America	3'542'140	0.8	23'392	53'901	180'036
Oceania	35'985'809	9.7	18'479	1'866	33'893
World**	76'403'777	1.6	3'669'201	124'845	4'616'468

*Source: FiBL survey 2023. Note: Agricultural land includes in-conversion areas and excludes wild collection, aquaculture, forest, and non-agricultural grazing areas. **Includes correction value for French overseas departments.*

Table 109: Key indicators by country 2021

Country/Territory	Organic area [ha]	Organic share [%]	Organic producers [no.]	Organic retail sales [Million €]	Export to EU and USA [MT]
Afghanistan	98	0.0			0
Albania	1'094	0.1	130		1'970
Algeria	772	0.0	64		2'919
Andorra	2	0.0			
Angola		0.0			9
Argentina	4'074'804	2.7	1'336		286'028
Armenia	583	0.0	27		124
Australia	35'687'799	9.9	1'829	1'694	1'805
Austria	679'119	26.5	23'961	2'397	415
Azerbaijan	38'080	0.8	446	3	1'228
Bahamas	49	0.3			
Bangladesh	504	0.0			55
Belarus	6'725	0.1	19		2'459
Belgium	101'828	7.4	2'590	978	
Belize	676	0.4	385		35
Benin	48'898	1.2	9'046		7'708
Bhutan	5'608	1.1	1'998	0	
Bolivia	179'425	0.5	14'161		21'125
Bosnia and Herzegovina	2'495	0.1	90	0	2'788
Botswana		0.0	1		0
Brazil	1'482'406	0.6	28'667	778	138'349
British Virgin Islands	26	0.4			
Brunei Darussalam		0.0			

Country/Territory	Organic area [ha]	Organic share [%]	Organic producers [no.]	Organic retail sales [Million €]	Export to EU and USA [MT]
Bulgaria	86'310	1.7	5'942	33	14
Burkina Faso	79'285	0.7	27'021		17'556
Burundi	549	0.0	668		73
Cambodia	21'112	0.4	4'135		7'880
Cameroon	1'594	0.0	632		288
Canada	1'215'589	2.1	6'916	5'284	168'189
Chad		0.0	2'960		610
Channel Islands	180	2.0			
Chile	152'773	1.0	3'288		70'518
China	2'753'700	0.5	14'847	11'319	149'042
Colombia	100'874	0.2	171		267'407
Comoros	937	0.7	637		42
Congo, Democratic Rep.	89'486	0.3	94'718		12'608
Cook Islands	15	1.0	58		
Costa Rica	10'300	0.6	47		33'647
Côte d'Ivoire	78'783	0.4	2'990		35'481
Croatia	121'924	8.1	6'024	99	27
Cuba	2'129	0.0	8		1'187
Cyprus	7'738	5.7	1'292		
Czech Republic	558'124	15.8	4'797	226	
Denmark	299'998	11.4	4'186	2'240	0
Djibouti		0.0			18
Dominica	2'907	11.6	258		
Dominican Republic	117'312	4.8	15'563		268'854
Ecuador	52'185	1.0	8'398		580'336
Egypt	116'000	3.0	970		52'073
El Salvador	2'565	0.2	374		317
Estonia	226'605	23.0	2'043	93	5'182
Eswatini	3'539	0.3	3		
Ethiopia	332'519	0.9	218'175	13	17'036
Falkland Islands (Malvinas)	31'937	2.8	3		
Faroe Islands	251	8.4	1		
Fiji	30'194	7.1	13		43
Finland	327'736	14.4	5'007	407	
France	2'776'554	9.6	58'413	12'659	1'874
French Guiana (France)	3'886	11.9	69		
French Polynesia	1'592	3.5	19		79
Georgia	4'278	0.2	729		730
Germany	1'802'231	10.8	36'307	15'870	245
Ghana	38'260	0.3	3'433		30'398
Greece	534'629	10.1	29'869	66	1'806
Grenada	195	2.4	5		4
Guadeloupe (France)	1'300	2.5	186		
Guatemala	71'654	1.9	141		13'038
Guinea		0.0			38
Guinea-Bissau		0.0			426
Guyana		0.0			433
Haiti	2'739	0.1	4'631		2'174
Honduras	66'179	2.0	15'046		68'581
Hong Kong		0.0			91
Hungary	293'597	5.9	5'129	30	
Iceland	6'440	0.4	30		
India	2'657'889	1.5	1'599'010	186	245'521
Indonesia	83'362	0.1	17'836		16'740
Iran	7'053	0.0	346		1'641
Iraq	63	0.0			

Country/Territory	Organic area [ha]	Organic share [%]	Organic producers [no.]	Organic retail sales [Million €]	Export to EU and USA [MT]
Ireland	86'868	1.9	1'914	235	16
Israel	5'778	0.9	345		24'629
Italy	2'186'159	16.7	75'874	3'943	27'447
Jamaica	11	0.0	2		6
Japan	11'992	0.3	3'678	1'419	5'138
Jordan	1'446	0.1	23		147
Kazakhstan	113'247	0.1	281		35'110
Kenya	128'018	0.5	44'565		9'749
Kosovo	1'990	0.5	56		561
Kuwait	32	0.0			
Kyrgyzstan	30'259	0.3	1'144		645
Lao	7'993	0.3	1'519		11'692
Latvia	291'150	14.8	4'171	51	
Lebanon	1'671	0.3	124		100
Lesotho		0.0	10		793
Liberia	2'791	0.1			
Liechtenstein	1'423	40.2	47	9	
Lithuania	261'782	8.9	2'529	51	3
Luxembourg	6'893	5.2	123	197	
Madagascar	95'083	0.2	61'974		5'259
Malawi	324	0.0	3		3'566
Malaysia	1'276	0.0	30		42
Mali	17'840	0.0	11'608		4'736
Malta	66	0.6	25		
Martinique (France)	706	2.3	77		
Mauritius	13	0.0	1		296
Mayotte	114	0.6	9		
Mexico	238'075	0.2	52'274		420'858
Moldova	28'368	1.3	151		19'358
Mongolia	241	0.0	314	1	
Montenegro	4'404	1.7	422		17
Morocco	11'452	0.0	423		21'246
Mozambique	41'048	0.1	1'358		5'311
Myanmar	10'143	0.1	68		95
Namibia	384	0.0	15		14
Nepal	2'448	0.1	1'048		240
Netherlands	76'375	4.2	1'985	1'374	669
New Caledonia	800	0.4			0
New Zealand	79'347	0.8	685	172	29'400
Nicaragua	37'357	0.7	10'912		11'884
Niger		0.0			700
Nigeria	58'028	0.1	2'308		906
Niue	117	2.3	2		
North Macedonia	7'794	0.6	887		662
Norway	45'112	4.6	1'778	442	
Oman	7	0.0	1		
Pakistan	69'850	0.2	934		45'625
Palestine	5'517	1.2	1'632		861
Panama	5'929	0.3	18		1'270
Papua New Guinea	88'014	7.4	12'827		2'494
Paraguay	113'147	0.5	5'591		78'790
Peru	374'926	1.6	117'398		344'162
Philippines	216'334	1.7	13'069		26'136
Poland	509'286	3.5	18'598	314	2
Portugal	308'289	7.8	13'263	21	3'228
Republic of Korea	40'663	2.5	25'362	486	331

Country/Territory	Organic area [ha]	Organic share [%]	Organic producers [no.]	Organic retail sales [Million €]	Export to EU and USA [MT]
Réunion (France)	2'100	4.4	427		
Romania	578'718	4.3	11'562	41	9
Russian Federation	655'457	0.3	66	183	61'865
Rwanda	4'696	0.3	8'930		730
Saint Lucia	25	0.2	1		
Samoa	82'299	29.1	1'993		51
Sao Tome and Principe	9'291	21.1	4'201		4'888
Saudi Arabia	27'110	0.0	400	306	277
Senegal	3'262	0.0	18'372		2'891
Serbia	23'527	0.7	458		19'432
Seychelles		0.0			24
Sierra Leone	193'954	4.9	5'507		16'236
Singapore	15	2.2		16	877
Slovakia	222'896	11.7	716		
Slovenia	52'078	10.8	3'685	49	
Solomon Islands	8'231	7.0	898		
Somalia		0.0	4		59
South Africa	97'359	0.1	1'307		28'450
South Sudan		0.0			
Spain	2'635'442	10.8	52'861	2'528	10'079
Sri Lanka	66'623	2.4	1'940		44'723
Sudan	960	0.0	1		4'997
Suriname	52	0.1	1		88
Sweden	606'669	20.2	5'360	2'764	45
Switzerland	181'444	17.4	7'670	3'705	32
Syrian Arab Republic		0.0			6
Taiwan	11'765	1.5	4'436		115
Tajikistan	22'292	0.5	166		
Tanzania, United	286'627	0.7	148'607		4'659
Thailand	167'985	0.8	73'611	12	27'974
Timor-Leste	32'311	8.5	3		724
Togo	130'858	3.4	19'709		72'731
Tonga	1'119	3.2	81		
Tunisia	279'389	2.9	7'101		68'079
Türkiye	327'583	0.9	48'244	46	170'732
Uganda	505'308	3.5	404'246		22'866
Ukraine	422'299	1.0	418	28	239'011
United Arab Emirates	5'419	1.4	152		319
United Kingdom	489'200	2.8	3'581	3'461	101'187
United States of America	2'326'551	0.6	16'476	48'618	11'847
Uruguay	2'741'845	19.6	1'417		961
Uzbekistan	4'925	0.0	26		1'257
Uzbekistan	4'925	0.0	26		1'257
Vanuatu	6'281	3.4	74		21
Venezuela	2'496	0.0	8		
Viet Nam	74'540	0.6	12'453		14'344
Zambia	3'376	0.0	10'872		20
Zimbabwe	1'085	0.0	10'379		314
Total	**76'403'777**	**1.6**	**3'669'201**	**124'845**	**4'616'468**

*Source: FiBL survey 2023. Note: Agricultural land includes in-conversion areas and excludes wild collection, aquaculture, forest, and non-agricultural grazing areas. **Includes correction value for French overseas departments.*

Annex II: Data Providers and Data Sources

In this chapter, we provide the data sources for our survey on organic worldwide. If not otherwise stated, the data is from 2021.

Several sources appear a number of times; here the full information;

- European Commission/TRACES: Imports into the European Union, market briefs https://agriculture.ec.europa.eu/cap-my-country/performance-agricultural-policy/studies-and-reports/market-analyses-and-briefs_en
- Eurostat: Area, crop and livestock production, operators for many European countries; https://ec.europa.eu/eurostat/web/agriculture/data/database
- GATS/USDA for US export and import data: USDA Foreign Agricultural Service's Global Agricultural Trade System, available at https://apps.fas.usda.gov/GATS/

Afghanistan

Source

› Area, operators: Certifier data.
› Exports (MT): GATS/USDA

Albania

Source

› Area, operators: Mediterranean Organic Agriculture Network (MOAN), Istituto Agronomico Mediterraneo di Bari (CHEAM Bari), Bari, Italy
›Wild collection: Certifier data
›Exports (MT) to the EU: European Commission/Traces

Algeria

Source

› Area and operators: Mediterranean Organic Agriculture Network (MOAN), MOAN Secretariat, Istituto Agronomico Mediterraneo di Bari (CHEAM Bari), Bari, Italy. The data is from 2017.
› Exports (MT): European Commission/Traces and GATS/ USDA

Andorra

Source

› Ecocert Iberica, Seville, Spain

Angola

› Area and operators: Certifier data were not received.
› Exports (MT)): European Commission/Traces

Argentina

Source

› Area, operator, production, export, retail sales (MT) data: provided by SENASA, www.senasa.gov.ar
›Exports (MT) to EU and USA: European Commission/Traces, and GATS/(USDA

Contact

› Diego Pinasco, SENASA, Buenos Aires, Argentina, www.senasa.gob.ar

Armenia

Source

› Area, operators: Survey of Ecoglobe - Organic control and certification body, Yerevan, Republic of Armenia, www.ecoglobe.am
› Exports (MT)) to EU and US: European Commission/Traces, GATS/USDA

Contact

› Eliza Petrosyan and Nune Darbinyan, Ecoglobe - Organic control and certification body, Yerevan, Republic of Armenia, www.ecoglobe.am

Australia

Source

› Area, operators (from 2018): Australian Organic (2019): Market Report 2019. Australian Organic, Nundah
› Land use and crop data from 2017. Source: Australian Bureau of Statistics ABS, provided by Els Wynen.[1]

[1] See Wynen, Els (2019): Organic Australia in 2010/11 and 2015/16. In: Willer, Helga and Julia Lernoud (Eds.) (2019): The World of Organic Agriculture. Research Institute of Organic Agriculture FiBL, Frick, and IFOAM – Organics International, Bonn. Available at https://www.organic-world.net/yearbook/yearbook-2019.html

› Retail sales: Australian Organic/IBISWORLD
› Exports (MT) to EU and USA: European Commission/Traces, GATS/USDA

Note

› See also the article about organic farming in Australia in this and in previous editions of "The World of Organic Agriculture."

Contact

› Nicole Ford and Kane Frampton, Australian Organic, Nundah, Australia

Austria

Sources

›Area, land use and operators: Bundesministerium für Landwirtschaft, Tourismus und Regionen, Vienna, Austria
› Retail sales: RollAMA based on GfK, AMA-Marketing, Agrarmarkt Austria Marketing GesmbH, Vienna, Austria
› Import data (MT): European Commission/Traces; exports to US: GATS/USDA

Contact

› Otto Hofer, Federal Ministry of Agriculture, Forestry, Environment and Water Management (AT), Vienna, Austria
› Pia Reindl and Barbara Köcher-Schulz, AMA-Marketing GesmbH AMA, Vienna, Austria

Azerbaijan

Source

› Area, operators (from 2015): Experimental and Resource Center affiliated to the Azerbaijan Botanic Center, Ganja, Azerbaijan, www.etkt.az.
› Retail sales (from 2011): see above
› Exports (MT) to EU and US: European Commission/Traces, GATS/USDA

Contact

› Dr Vugar Babayev, Ganja Agribusiness Association (GABA), Ganja, Azerbaijan, www.etkt.az.

Bahamas

› Certifier data.

Bahrain

Processing only: Certifier data,

Bangladesh

Source

› Certifier data
› Please note that due to the multiple and changing data sources, a direct year-to-year comparison is not possible for Bangladesh.
› Exports (MT) to EU and US: European Commission/Traces, GATS/USDA

Contact

› Dr. Shaikh Tanveer Hossain, IFOAM Asia
› Dr Khurshid Alam, BARI, Bangladesh

Belarus

Source

› Area, operators: Ecoidea project, Minsk, Belarus
› Exports (MT)) to EU: European Commission/Traces

Contact

Tatsiana Ostrouh. Ecoidea project, Minsk, Belarus

Belgium

Sources

› Area and operator data: Biowallonie, Brussels, Belgium
› Crop and livestock data (2020): Eurostat database, Eurostat, Luxembourg
› Biowallonie, Brussels, Belgium
› Retail sales share of total: Landbouw en Visserij, Brussels, Belgium
› Import data: European Commission/Traces

Contact

› Ilse Timmermans, Landbouw en Visserij, Brussels, Belgium

Belize

Source

› Area and producers: Certifier data.
› Exports (MT)) to EU: European Commission/Traces

Benin

Sources

Area, operators (updates were not received from all certifiers)
› CERTISYS, Bolline, Belgium, www.certisys.eu.
› Control Union, Zwolle, The Netherlands, www.controlunion.org
› Ecocert Burkina Faso, Ouaga, Burkina Faso, www.ecocert.com
› Kiwa BCS, Nürnberg, Germany, www.bcs-oeko.de
›OneCert international, Jaipur, India
›Textile exchange, cotton area data
›Exports (MT) to the EU: European Commission/Traces

Bermuda

› No data were received for Bermuda

Bhutan

Source

›Area, operators: National center for Organic Agriculture (NCOA) Thimphu, Bhutan, www.moa.gov.bt

Contact

›Om Prakash Ghalley, National center for Organic Agriculture (NCOA), Department of Agriculture, Ministry of Agriculture and Forests, Yusipang, Bhutan
›Kesang Tshomo, Ministry of Agriculture and Forestry,
›National Organic Flagship Programme, Thimphu, Bhutan, www.moa.gov.bt

Bolivia

Source

› Area, operator, production, operators (2020) from SENASAG, provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Bosnia Herzegovina

Source

› Area, producers: Ministry of Agriculture, Water Management and Forestry, Sarajevo, Bosnia and Herzegovina
› Crop details are from 2019 and were provided by the Mediterranean Organic Agriculture Network (MOAN, Bari, Italy
› Exports (MT) to EU: European Commission/Traces
› Retail sales (2017): Organska Kontrola, Sarajevo, Bosnia and Herzegovina

Contact

› Elda Hodžić-Isović, Ministry of Agriculture, Water Management and Forestry, Sarajevo, Bosnia and Herzegovina

Botswana

› Area (wild collection), producers: Certifier data
› Exports (MT) to EU: European Commission/Traces

Brazil

Sources

› Area and operator data: Ministério da Agricultura, Pecuária e Abastecimento/Ministry of Agriculture, Livestock and Food (MAPA). Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina. To this data, the area and operator data of two international certifiers as well data from the Textile Exchange (https://textileexchange.org/) were added by FiBL. The data of these certifiers are currently not registered under the system of the MAPA. For MAPA data, see Table 88.
› Exports (MT) to EU and USA: European Commission/Traces and GATS/USDA
› Total export value and retail sales data: Organic Brazil (2016 data)

Note

› Please note that area and operator data from MAPA may include PGS data.
› Please note that land use and crop details were available only from international certifiers; hence, for the crops, not the total organic farmland is covered.

Contact

› Virgínia Mendes Cipriano Lira, Ministério da Agricultura, Pecuária e Abastecimento (DTEC/SDA/MAPA), Coordenadora de Produção Orgânica, Brasilia, Brazil

British Virgin Island

Source

› Area, operators: Certifier data.
› Exports (MT)): European Commission/Traces, USDA

Brunei Darussalam

› Certifier data
› Exports (MT) to EU: European Commission/Traces

Bulgaria

Sources

›Land area, operators: Ministry of Agriculture, Sofia, Bulgaria, provided by Bioselena, Karlovo, Bulgaria
›Retail sales: FAS (2022): Organic Market Annual Report Bulgaria. FAS/GAIN, USDA, Washington. Available at https://apps.fas.usda.gov/newgainapi/api/Report/DownloadReportByFileName?fileName=Organic%20Market%20Annual_Sofia_Bulgaria_01-21-2022
› Import data: European Commission/Traces
› Exports [MT] to US: GATS/USDA

Contact

› Dr. Stoilko Apostolov, FOA Bioselena, Karlovo, Bulgaria. www.bioselena.com

Burkina Faso

Sources

Area, operators: Certifier data
›
› Exports (MT)) to EU:, European Commission/Traces

Burundi

Source

› Certifier data
› Exports (MT)) to EU: European Commission/Traces

Cambodia

Source

› Area/operators: Certifier data.
› Exports (MT)) to EU and USA: European Commission/Traces, GATS/USDA

Cameroon

Source

› Ecocert West Africa, Ouagadougou, Burkina Faso, www.ecocert.com. Producer data are from 2017.
›Ecocert East Africa, Antananarivo, Madagascar
› Exports (MT) to EU and US: European Commission/Traces and GATS/USDA

Canada

Source

› Land area, producers and other operator types, retail sales, market data: Canada Organic Trade Association (COTA), Ottawa, Canada
› Exports (MT) to EU and US: European Commission/Traces and GATS/USDA

Contact

› Tia Loftsgard and Diana Zeidan, Canada Organic Trade Association, Ottawa, Canada, http://ota.com/otacanada.html

Note

See also the article about organic farming in Canada in this and in previous editions of "The World of Organic Agriculture."

Cape Verde

› No data

Chad

›Area (wild collection): Certifier data.
› Exports (MT) to EU: European Commission/Traces

Channel Islands

Source

›Area: FAOSTAT (2019) Organic area data Channel Islands. The FAOSTAT website, FAOSTAT, Rome, Italy, https://www.fao.org/faostat/en/#data FAOSTAT > Land, Inputs and Sustainability

Chile

Source

› Area data, producers/ smallholders, livestock and export/import data: Servicio Agrícola y Ganadero (SAG), Santiago, Chile, www.sag.gob.cl, provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Retail sales data (2009) according to USDA: Organic Products Report Chile. GAIN Report Number CI0031. November 30, 2010
› Exports (MT) to EU and USA: European Commission/Traces, USDA

Contact

› María José Pizarro Álvarez and Oficina de Estudios y Políticas Agrarias (ODEPA), Ministerio de Agricultura, Teatinos 40, Santiago, Chile, www.odepa.gob.cl
› Claudio Cárdenas Catalán, Servicio Agrícola y Gandero (SAG), Ministerio de Agricultura, Santiago, Chile, http://www.sag.cl

China

Sources

› Land area, operators, market/retail sales and export data; Chinese Agricultural University, Beijing, China
› For the cotton area, data from the Textile Exchange (https://textileexchange.org/)were used.
› Exports (MT) to EU and USA: European Commission/Traces, USDA

Contact

› Yuhui Qiao, Chinese Agricultural University, Beijing, China

Colombia

Source

› Area data: from Federación Orgánicos de Colombia.
› Exports (MT) to EU and USA: European Commission/Traces, GATS/USDA

Contact

› Luis Betancourt, National University of Colombia, Bogotá, Colombia.

Note

› The data from Federación de Orgánicos de Colombia is based on estimates.

Comoros

Source

› Area and operators: Ecocert East Africa, Antananarivo, Madagascar
› Exports (MT)) to EU: European Commission/Traces

Congo, Democratic Republic of

› Area and producers: Certifier data.
› Exports (MT)) to EU and USA: European Commission/Traces, GATS/USDA

Cook Islands

Source

› Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int.

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva, Fiji, www.spc.int

Costa Rica

Source

› Area and operator data: Servicio Fitosanitario del Estado (SFE), M.A.G. Costa Rica, San José. Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Exports (MT) to EU and USA: European Commission/Traces, USDA

Côte d'Ivoire

Sources

The data were compiled by FiBL based on the data of the following international certifiers:
› CERTISYS, Bolline, Belgium
› Control Union, Zwolle, The Netherlands, www.controlunion.org
› Ecocert West Africa, Ouagadougou, Burkina Faso, www.ecocert.com

Exports (MT) to EU and USA: European Commission/Traces, GATS/USDA

Croatia

Sources

› Area and operators: Eurostat database organic farming, Eurostat, Luxembourg
› Market (from 2014) & export value data (from 2011): Darko Znaor, Independent Consultant, 10000 Zagreb, Croatia
› Import data (MT): European Commission/Traces
› Exports to the US [MT]: GATS/USDA

Cuba

› Area and operators: Certifier data (2019)
› Exports (MT)) to EU and USA: European Commission/Traces, GATS/USDA

Cyprus

Source

› Land area and producer data: Eurostat database, Eurostat, Luxembourg
› Market data (from 2006): Organic Retailers Association, Ecozept and Biovista (eds.) (2008): Specialised Organic Retail Report 2008. Freising and Vienna 2008
› Import data (M): European Commission/Traces
› Exports (MT) to the USA: GATS/USDA

Czechia

Source

› Area, operators, market and international trade data: Institute of Agricultural Economics and Information (UZEI), Department of Agri-environmental Policy, 602 00 Brno, Czech Republic. The market and international trade data are from 2019.
› Import data (MT): European Commission/Traces

Contact

› Hana Šejnohová, Institute of Agricultural Economics and Information (UZEI), Department of Agri-environmental Policy, Brno, Czech Republic
› Andrea Hrabalová, Brno, Czech Republic

Denmark

Sources

› Land area, land use (2020), Operators: Eurostat database, Eurostat, Luxembourg
› Retail sales: Landbrug & Fødevarer. Based on data from Statistics Denmark (general retail sales) and Organic Denmark (for other marketing channels)
› Foodservice, import and export value (euros): Statistics Denmark
› Import data (MT): European Commission/Traces

Contact

› Ejvind Pedersen, Danish Agriculture & Food Council, Copenhagen, Denmark

Djibouti

› Area/Operators: No data were reported
›Export s(MT) to EU and USA: European Commission/Traces, GATS/USDA

Dominica

Source

› Area and operators: Certifier data

Dominican Republic

Source

› Area, operators, and production data (2020) from Secretaria de Estado de Agricultura, Oficina de Control Orgánico, Santa Domingo, Dominican Republic, www.agricultura.gob.do. Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Exports (MT)) to EU and USA: European Commission/Traces, GATS/ USDA

Contact

› Leandro Duarte Nina Fortuna, Director Oficina de Control de la Agricultura Orgánica, ViceMinisterio de Extensión y Capacitación Agropecuarias, Ministerio de Agricultura, Santa Domingo, Dominican Republic, www.agricultura.gob.do.

Ecuador

Source

› Area, operators, production, and export data (total in MT and euros): Agrocalidad, Quito, Ecuador, www.agrocalidad.gob.ec Data were

provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Retail sales and export value data from 2017.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Rommel Aníbal Betancourt Herrera, Agrocalidad, Quito, Ecuador

Egypt

Source

› Mediterranean Organic Agriculture Network (MOAN), MOAN Secretariat Istituto Agronomico Mediterraneo di Bari (CIHEAM Bari), Bari, Italy
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

El Salvador

Source

› Area, operators, production, export, retail sales data from the Ministerio de Agricultura y Ganadería (MAG), Final 1a. Avenida Norte, 13 Calle Poniente y Avenida Manuel, Gallardo, Santa Tecla, El Salvador Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Jose Fernando Maldonado Cestona, Coordinador Area de Inocuidad de Alimentos y Agricultura Orgánica Ministerio de Agricultura y Ganadería Dirección General de Sanidad Vegetal, El Salvador

Equatorial Guinea

› Wild collection/operators: Certifier data
› For this country, only export data are available (European Commission/Traces). Information on area and producers should be sent to helga.willer@fibl.org

Estonia

Sources

› Land area, land use, operators: Eurostat database, Eurostat, Luxembourg
›Wild collection: Estonian Organic Farming Foundation (2022): Organic Farming in Estonia 2021. Tartu. Available at http://www.maheklubi.ee/upload/Editor/mahe_eestis_2021_est_eng_digi.pdf
›Retail sales data: Estonian Institute of Economic Research, Estonia
› Export data (euros): Estonian Ministry of Agriculture
› Exports (MT)) to the USA: USDA
› Import (MT): European Commission/Traces
› A detailed report about organic farming in Estonia can be found at http://www.maheklubi.ee/mison/eestis/

Contact

› Merit Mikk, Centre of Ecological Engineering, Tartu, Estonia

Eswatini

› Area and operators: Certifier data
› Exports (MT)) to EU: European Commission/Traces

Ethiopia

Sources

Area and operator data
› CERES–CERT, Frick, Switzerland
› Control Union, Zwolle, The Netherlands
› Ecocert South Africa, Stellenbosch, South Africa
› Letis, Santa Fe, Argentina,
› Onecert, Mansarovar, Jaipur, India, www.onecert.com
› Textile Exchange, London, UK (for Cotton data)

Exports (MT)) to EU and USA: European Commission/Traces, GATS/USDA

Falkland Islands/Malvinas

Source

› Department of Agriculture, Bypass Road, Stanley, Falkland Islands, www.agriculture.gov.fk.

Contact

› Lucy Ellis, Department of Agriculture, Bypass Road, Stanley, Falkland Islands, www.agriculture.gov.fk

Faroe Islands

Source

› Vottunarstofan Tún ehf, Laugavegur 7, 101 Reykjavík, Iceland, www.tun.is.

Contact

› Gunnar Gunnarsson, Vottunarstofan Tún ehf., Reykjavík, Iceland, www.tun.is

Fiji Islands

Source

› Area and operator data: Pacific Organic and Ethical Trade Community (POETCom), Suva, Fiji, www.spc.int
› Exports (MT)) to EU: European Commission/Traces

Contact

› Karen Mapusua, Pacific Organic and Ethical Trade Community (POETCom), Suva, Fiji

Finland

Sources

- Land area and operators: Finnish Food Authority, data provided by Pro Luomu, Kauniainen, Finland
- Market data: Pro Luomu, Kauniainen, Finland
- Export data (2019): Pro Luomu, Kauniainen, Finland. Organic exports are estimated at 25 to 30 million euros
- Import data: European Commission/Traces

Contact

- Aura Lamminparras, Pro Luomu, Kauniainen, Finland

France

Source

- Area and operators: Agence Bio, Montreuil-sur-Bois, France. www.agencebio.org, and for 2020 crop details: Eurostat database, Eurostat Luxembourg
- Retail sales: Agence Bio, Montreuil-sur-Bois, France
- Export and import values: Agence Bio, Montreuil-sur-Bois, France
- Import data (MT): European Commission/Traces
- Exports to US (MT): GATS/USDA

French Guyana

Source

- Agence Bio, Montreuil-sur-Bois, France. www.agencebio.org.

French Polynesia

Source

- Area and operators: Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int.
- Exports (MT)) to EU: European Commission/Traces

Contact

- Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

Gambia

The certifier, who had provided data in the previous years, did not report activities anymore. No imports from Gambia into the European Union were reported.

Georgia

Source

- Area and operators: Elkana Survey, Elkana, 16 Gazapkhuli Street, 0177 Tbilisi, Georgia, www.elkana.org
- Exports (MT)) to EU and USA: European Commission/Traces, GATS/USDA

Contact

- Elene Shatberashvili and Mariam Jorjadze, Biological Farming Association Elkana, Tbilisi, Georgia, www.elkana.org.ge

Germany

Sources

- Area and operator data: Federal Agency for Agriculture BLE, Bonn, Germany
- Crop and livestock details: Agrarmarkt Informations-Gesellschaft mbH (AMI), Bonn, Germany, www.ami-informiert.de.
- Retail sales: Arbeitskreis Biomarkt (Working group organic market), coordinated by AMI based on data of GfK, Nielsen, bioVista und Klaus Braun Kommunikationsberatung
- Import data (MT): European Commission/Traces
- Exports to the US (MT): GATS/USDA

Contact

- Diana Schaack, Agrarmarkt Informations-Gesellschaft mbH (AMI), Bonn, Germany, www.ami-informiert.de

Ghana

Source

The data was compiled by FiBL based on the data of the following international certifiers.

- CERES-CERT, Frick, Switzerland
- CERTISYS, Bolline, www.certisys.eu

Control Union, Zwolle, The Netherlands, www.controlunion.org
Ecocert, East Africa
Exports (MT)) to EU and US: European Commission/Traces and GATS/USDA

Greece

Sources

- Land area and operators (2020): Eurostat database, Eurostat, Luxembourg.
- Market data: Daso Business Performance PC, Strategy & Management Consultants, Thessaloniki, Greece
- Wild collection data (2015) Mediterranean Organic Agriculture Network (MOAN), MOAN Secretariat Istituto Agronomico Mediterraneo di Bari (CIHEAM Bari), Bari, Italy
- Import data (MT): European Commission/Traces
- Exports to US (MT): GATS/USDA

Contact

- Nicolette van der Smissen, Feres, Greece

Grenada

Area and operators: Certifier data.

Exports (MT)) to EU and USA: European Commission/Traces, USDA

Guadeloupe

Source

› Agence Bio, Montreuil-sur-Bois, France. www.agencebio.org.

Guatemala

Source

› Area, operators, and total export data: Department of Organic Agriculture, Ministerio de Agricultura, Ganaderia y Alimentación (MAGA), Ciudad de Guatemala, Guatemala C.A. 01013, www2.maga.gob.gt. Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Operators: Certifier data
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Lauro Antonio Rivera Gramajo, Dirección de Fitozoogenética y Recursos Nativos (DFRN), Viceministerio de Sanidad Agropecuaria y Regulaciones (VISAR), Ministerio Agricultura, Ganadería y Alimentación (MAGA), Ciudad de Guatemala, Guatemala, https://visar.maga.gob.gt/

Guinea

› Operators: Certifier data. No data on the area were provided.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Guinea Bissau

› No area or operator data were provided.
› Exports (MT)) to EU: European Commission/Traces

Guyana

Source

› Area: Wild collection (2019) : Certifier data
› Exports (MT)) to EU: European Commission/Traces

Haiti

Sources

› Area and operators: Certifier data
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Honduras

Source

›Area and operators: (2020): SENASA Honduras, SAG, Tegucigalpa, Honduras; crop details based on data from certifiers.
› Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Hungary

Sources

› Land area and operator data: Eurostat and National Food Chain Safety Office, Food and Feed Safety Office, Food Trade Control Department, Hungary, www.nebih.gov.hu, and Eurostat database, Eurostat, Luxembourg
› Market and trade data (2009/2015): Survey/Estimate by Ferenc Frühwald, Budapest, Hungary
› Import data (MT): European Commission/Traces
› Exports to the US (MT): GATS/USDA

Contact

› Dora Drexler, Hungarian Institute of Organic Agriculture ÖMKi, Budapest, Hungary, www.biokutatas.hu

Iceland

Source

› Vottunarstofan Tún ehf., Reykjavík, Iceland, www.tun.is.

Contact

› Gunnar Gunnarsson Vottunarstofan Tún ehf., Reykjavík, Iceland, www.tun.is

India

Source

› Land area, operators, exports: Agricultural and Processed Food Products Export Development (APEDA) Ministry of Commerce & Industry, Government of India, New Delhi, India, www.apeda.com. Crop area data were not available from APEDEA; area data for cotton were added from the Textile Exchange.
› Retail sales data (2017): ICCOA- International Competence Centre for Organic Agriculture, Karnataka, India
› Exports (MT) to EU and USA: European Commission/Traces, USDA

Note

›In addition to the 3rd party certified area, there were 884'105 hectares with PGS certification managed by a total of 1'426'766 farmers organised in 53'917 PGS groups. The data is available at: http://pgsindia-ncof.gov.in.

Indonesia

Source

› Area data were compiled from several international certifiers

› For the producers, the data from the Indonesian Organic Alliance were maintained (from 2017). Further clarification is needed for Indonesia.
› Exports (MT) to EU and USA: European Commission/Traces, USDA

Iran

Sources

› Area and operators: Certifier data
› Beehives: Shahid Beheshti University ESRI, Evin, Tehran, Iran. The data is from 2017.
› Exports (MT)) to EU and USA: European Commission/Traces, GATS/USDA

Note

Please note that the data source has changed. The data was compiled by FiBL based on the data from 3 international certifiers. Previously data were provided by the Shahid Beheshti University ESRI, Evin, Tehran, Iran (last update: 2017).

Iraq

Source

› Zakho Small Villages Projects (ZSVP), Dohuk City, Dohuk, Iraq. The data is from 2019.

Contact

› Dr Abid Ali Hasan, Zakho Small Villages Projects (ZSVP), Program Coordinator in Iraq, Dohuk City, Dohuk, Iraq

Ireland

Sources

› Area and Operators: Eurostat, Luxembourg
›Aquaculture: European Market Observatory for Fisheries and Aquaculture Products (2022): Organic Aquaculture in the EU. European Commission, Brussels. Available at https://www.eumofa.eu/documents/20178/432372/Organic+aquaculture+in+the+EU_final+report_ONLINE.pdf
› Retail sales: (2022): Bord Bia, Dublin, Ireland.
› Import data (MT): European Commission/Traces
› Exports (MT) to USA:, GATS/USDA

Note

Throughout the printed version, the operator numbers for Irland are missing. For 2021, these numbers are: exporters: 58; importers: 156; processors: 215; producers: 1'914. The total numbers for the European Union, Europe and the World in the various tables of this book have been corrected in the PDF version.

Israel

Source

› Area and operators: Standardisation and Accreditation Department Ministry of Agriculture and Rural Development Plant Protection and Inspection Services (PPIS), Israel, www.ppiseng.moag.gov.il/ppiseng/ISREAL
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Tal Weil Tzameret, Standardization and Accreditation Department, Ministry of Agriculture and Rural Development, Plant Protection and Inspection Services (PPIS), Israel

Italy

Sources

› Organic area and operators: Mediterranean Organic Agriculture Network (MAON), Bari, Italy
› Retail sales: Nomisma, Bologna, Italy. Please note that the data is from July 2022. Just as the 2021 data re from July 2021.
› Export values: Nomisma, Bologna, Italy (July 2022)
› Import data (MT): European Commission/Traces
› Exports to the US (MT): GATS/USDA

Contact

› Silvia Zucconi, Nomisma, Bologna, Italy

Jamaica

Source

› Certifier data
› Exports (MT)) to the USA: USDA

Japan

Source

› Area and producer (2020) data: Ministry of Agriculture, Forestry and Fisheries (MAFF), Tokyo, Japan
› Domestic market data (2018): Ministry of Agriculture, Forestry and Fisheries (MAFF), Tokyo, Japan. Data provided by the Italian Embassy in Tokyo at a presentation at SANA 2019, Bologna
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Jordan

Source

› Area and operators: Mediterranean Organic Agriculture Network (MOAN), MOAN Secretariat Istituto Agronomico Mediterraneo

di Bari (CIHEAM Bari), Bari, Italy. The data is from 2017.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Kazakhstan

Sources

Area and operators
› CERES-CERT, Frick, Switzerland
› Ekoagros, Kaunas, Lithuania,
› Letis, Rosario, Santa Fe, Argentina
› Organic Standard, Kyiv, Ukraine
Exports (MT)) to EU and USA: European Commission/Traces, USDA

Kenya

Source

› Area and operators: Kenya Organic Movement (KOAN), Nairobi, Kenya, www.koan.co.ke
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Samuel Ndungu, Kenya Organic Movement (KOAN), Nairobi, Kenya, www.koan.co.ke

Korea, Republic of

Source

› Area, operators and retail sales: Korea Institute of Rural Social Affairs, Chungnam Province, Republic of Korea, Republic of Korea
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Jennifer Chang, Korean Federation of Organic Agriculture Organisations (KFSA), Republic of Korea
› Hakkyun Jeong, Korea Institute of Rural Social Affairs, Chungnam Province, Republic of Korea

Kosovo

Source

› Area and operators: Mediterranean Organic Agriculture Network (MOAN), MOAN Secretariat Istituto Agronomico Mediterraneo di Bari (CIHEAM Bari), Bari, Italy
›Wild collection: Ministry of Agriculture, Forestry and Rural Development MARFD¸ Pristina
› Export value (2015): Ministry of Agriculture, Forestry and Rural Development, Pristina, Kosovo
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Kuwait

Source

› Ecocert India, Aurangabad, Maharashtra, India, www.ecocert.com

Contact

› Amresh Kumar Pandey, Ecocert India, Aurangabad, Maharashtra, India, www.ecocert.com

Kyrgyzstan

Source

› Area and operators: Agricultural Commodity and Service Cooperative "Bio Farmer", Kyrgyzstan. To this data, the data of three international certifiers as well as data from Textile Exchange (Cotton) was added
› Exports (MT)) to EU: European Commission/Traces

Contact

› Nurbek Kannazarov, Organic Farming Kyrgyzstan

Lao People's Democratic Republic

Source

› Area and operators: Certifier data
› Exports (MT)) to EU and USA: European Commission/Traces, USDA
› ACT Ecocert India, Onecert

Latvia

Source

› Area and Operators (2020): Eurostat database, Eurostat, Luxembourg
› Market data (from 2017): Retail sales and export data: Moreganic Sourcing AB (2018): Baltic Organic Market Report 2018/2019. Moreganic Sourcing, Uppsala, Sweden
› Import data (MT): European Commission/Traces

Lebanon

Source

› Area and operators: CCPB Middle East, Beirut, Lebanon
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Angel Atallah, CCPB Middle East, Beirut, Lebanon

Lesotho

› Area and producers: Certifier data.
› Exports (MT)) to EU: European Commission/Traces

Liberia

Area/Operators: Certifier data

Liechtenstein

Source

› Klaus Büchel Anstalt, Institute of Agriculture and Environment, Mauren, Liechtenstein, www.kba.li.

Contact

› Florian Bernardi and Klaus Büchel, Institute of Agriculture and Environment, Mauren, Liechtenstein, www.kba.li.

Lithuania

Source

›Land area, production, operators: Ekoagros, Kaunas, Lithuania

› Market data: Retail sales and export data (2017): Moreganic Sourcing AB (2018): Baltic Organic Market Report 2018/2019. Moreganic Sourcing, Uppsala, Sweden

› Import data (MT): European Commission/Traces

Contact

› Virginija Luksiene, Ekoagros, Kaunas, Lithuania

Luxembourg

Source

› Land area and operator data: Administration des Services Techniques de l'Agriculture, Service de la protection des végétaux, Luxembourg, www.asta.etat.lu and Eurostat, Luxembourg

› Market data: Oekopolis. Organic shares of total retail sales were calculated by FiBL using Eurostat retail sales data

› Import data (MT): European Commission/Traces

Contact

› Claudine Schmit, Ministère de l'Agriculture, de la Viticulture et de la Protection des consommateurs, Luxembourg, www.asta.etat.lu

› Aender Schanck, Biogros, Munsbach, www.biogros.lu

Madagascar

Area and producers: Certifier data. Not all certifiers provided updated data. Ecocert East Africa

› Exports (MT)) to EU: European Commission/Traces

Malawi

Sources

› Area and operators: Certifier data

› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Malaysia

› Area and operators: Certifier data.

› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Maldives

› Area and operator data were not received.

› Exports (MT)) to EU: European Commission/Traces

Mali

› Area and operators: Certifier data. Tot this data, cotton data from the Textile Exchange were added.

› Exports (MT)) to EU: European Commission/Traces

Malta

Source

› Area, operators, livestock, production: Mediterranean Organic Agriculture Network, Bari, Italy and Eurostat database, Eurostat, Luxemburg

› Import data (MT): European Commission/Traces

Martinique (France)

Source

› Agence Bio, Montreuil-sur-Bois, France, www.agencebio.org

Mauritius

Source

› Area, and producers: Ecocert offices in Africa. www.ecocert.com

› Exports (MT)) to EU: European Commission/Traces

Contact

› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Mayotte (France)

Source

› Agence Bio, Montreuil-sur-Bois, France. www.agencebio.org

Mexico

Source

› Area and operators: Subdirectora de Autorización y Aprobación de Organismos de Coadyuvancia, Servicio Nacional de Sanidad, Inocuidad y Calidad Agroalimentaria (SENASICA), Secretaría de Agricultura y Desarrollo Rural (SADER), Ciudad de México, México. Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina

› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Aurora Josefina Lobato García, Responsable de control de productos orgánicos., Servicio Nacional de Sanidad, Inocuidad y Calidad Agroalimentaria (SENASICA), Secretaría de Agricultura y Desarrollo Rural (SADER), Ciudad de México, México

Moldova

Source

›Area and operators: Ministry of Agriculture and Food Industry, Chişinău, Moldova

› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

›Marcela Stahi, Head of the Department for Organic Production and Products of Origin. Ministry of Agriculture and Food Industry of the Republic of Moldova, Chişinău, Moldova

Monaco

Certifier data (2019)

Mongolia

› Area, operators, retail sales (2020): Department of Coordination for Food Production Policy Implementation, Ministry of Food Agriculture and Light industry of Mongolia

Contact

› Tungalag Davaa, Senior officer, Department of Coordination for Food Production Policy Implementation, Ministry of Food Agriculture and Light industry of Mongolia

Note

Please note that the data refer to PGS operations certified under the governments' accreditation system. Historical data are currently revised by the government.

Montenegro

Source

› Area and operators: Ministry of Agriculture and Rural Development, Podgorica, Montenegro and Eurostat, Luxembourg

› Market data (from 2010): Ecozept - Market research and marketing consulting agency. Freising, Germany

› Exports (MT)) to EU: European Commission/Traces

Contact

›Milica Bućković, Ministry of Agriculture, Forestry and Water Management, Podgorica, Montenegro

Morocco

Sources

› Area and operators (2020): Mediterranean Organic Agriculture Network (MOAN), MOAN Secretariat Istituto Agronomico Mediterraneo di Bari (CIHEAM Bari), Bari, Italy

› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Mozambique

Sources

Area and operators: Certifier data
Exports (MT)) to EU: European Commission/Traces

Myanmar

› Area and operators: Certifier data.

›Exports (MT)) to EU and USA: European Commission/Traces, USDA

Namibia

› Area and operators: Certifier data. For cotton, data from the Textile exchange were added.

›Exports (MT)) to EU and USA: European Commission/Traces, USDA

Nepal

Source

› Area and operators: Certifier data were compiled based on the data of 4 international certifiers, not all of which provided updated data.

› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Netherlands

Sources

› Land area and operator data: Eurostat database, Eurostat, Luxembourg.

› Retail sales and export data: Bionext, Ede, The Netherlands; the Bionext website, https://bionext.nl/.

› Import data (MT): European Commission/Traces

› Exports to the US (MT): GATS/USDA

Contact

› Marian Blom, Bionext, Ede, The Netherlands, www.bionext.nl

New Caledonia

Source

› Area and operators: Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int

› Exports (MT)) to EU: European Commission/Traces

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

New Zealand

Source

› Area, operators, retail Sales: Organics Aotearoa New Zealand, Wellington, New Zealand, www.oanz.org.nz, provided by Agribusiness group.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Jon Manhire, the AgriBusiness Group, Christchurch, New Zealand, www.agribusinessgroup.com

Nicaragua

Source

› Area and operators: Instituto de Protección y Sanidad Agropecuaria (IPSA), Departamento de Inspección Certificación Fitosanitaria, Managua, Nicaragua, www.magfor.gob.ni Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Ing. Ramón Ernesto Noguera García, Instituto de Protección y Sanidad Agropecuaria IPSA, Departamento de Inspección Certificación Fitosanitaria, Managua, Nicaragua, www.magfor.gob.ni

Niger

› Area and operator data were not received.
› Exports (MT)) to EU: European Commission/Traces

Nigeria

Source

› Area and operators: Certifier data
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Note

› Producers: Please note that the certifiers did not provide the total number of producers; in most cases, only the number of companies/projects/certificates were provided. The number of producers must therefore be considerably higher.

Contact

› Olugbenga O. AdeOluwa, University of Ibadan, Nigeria

Niue

Source

› Area (2018): Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

North Macedonia

Source

› Land area and operator data: Eurostat database, Eurostat, Luxembourg
› Wild collection: Certifier data
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Norway

Sources

› Land area (2019) and operator (2020) data: Eurostat database, Eurostat, Luxembourg
› Market data (2019) for general retailers: Norwegian Agriculture Agency (Landbruksdirektoratet), Oslo, Norway, based on Nielsen data. The total retail sales data were compiled by FiBL based on data from the Norwegian Agriculture Agency and experts estimates on further sales channels.

Contact

› Anders Hellestveit, Norwegian Agriculture Agency (Landbruksdirektoratet), Oslo, Norway

Oman

Source

› Certifier data

Pakistan

› Area and producers: Certifier data. For the number of the producers, data from the Textile Exchange were added-
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Palestine, State of

› Area for agricultural land, production, beehives, total wild collection area: Mediterranean Organic Agriculture Network (MOAN), MOAN Secretariat Istituto Agronomico Mediterraneo di Bari (CIHEAM Bari), Bari, Italy
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Panamá

Source

› Area and operators (2018): Ministerio de Desarrollo Agropecuario, Dirección Nacional

de Sanidad Vegetal, Panama, www.mida.gob.pa.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Papua New Guinea

Source

› Area and operators: Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

Paraguay

Source

› Area and operators: Servicio Nacional de Calidad y Sanidad Vegetal y de Semillas (SENAVE), Department of Organic Agriculture, Asuncion, Paraguay, www.senave.gov.py Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Grazed non-agricultural land: Certifier data.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Genaro Coronel, Servicio Nacional de Calidad y Sanidad Vegetal y de Semillas, Department of Organic Agriculture, Asuncion, Paraguay, www.senave.gov.py

Perú

Source

› Area and number of producers: SENASA. Producción Orgánica. Lima, Perú. Data were provided via Comisión Interamericana de Agricultura Orgánica (CIAO), Buenos Aires, Argentina
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Marly Cristina López Rengifo, Dirección General Agrícola (DGA – MINAGRI). Secretaria Técnica del Consejo Nacional de Productos Orgánicos (CONAPO)

Philippines

Sources

Area and operators: The data were compiled by FiBL from a number of certifiers, but there are more certifiers active than those listed below. Certifiers who provided data (not all with updates):

› CERES-CERT: Frick, Switzerland, www.ceres-cert.com
› Control and Certification for Organic Products Office (CCPB), Ufficio Attività di Controllo e Certificazione Prodotti Biologici, Bologna, www.ccpb.it
› Control Union, Zwolle, The Netherlands, www.controlunion.org;
› Ecocert India, Aurangabad, Maharashtra, India, www.ecocert.com
› Kiwa BCS, Nürnberg, Germany, www.bcs-oeko.de

Exports (MT)) to EU and USA: European Commission/Traces, USDA

Note

› A direct year-to-year comparison over the years is not possible as not all certifiers provide updates every year.

Poland

Source

› Land area and producers (2020): Eurostat database, Eurostat, Luxembourg
› Retail sales: Biokurier, Bydgoszcz
› Import data (MT): European Commission/Traces
› Exports to the US (MT): GATS/USDA

Portugal

Source

› Organic land and operators: Eurostat database, Luxembourg
› Market data (2011): INTERBIO, http://www.interbio.pt
› Import data (MT): European Commission/Traces
› Exports to the US (MT): GATS/USDA

Puerto Rico

Certifier data (from 2016).

Réunion

Source

› Agence Bio, Montreuil-sur-Bois, France. www.agencebio.org

Romania

Sources

› Organic area, land use, livestock and production: Eurostat database, Luxemburg.
› International trade values (in Euros, from 2011): BCG-Global Advisors (2013) Romanian Organic Sector – Business Insight Booklet. Global Advisors, Bio-Romania Association, University of Bucharest. Bucharest 2012
› Retail sales data: Dobrescu, Monica (2017): Romania: Organic production and market overview. GAIN Report No. RO 1702. The

USDA FAS website. USDA, Washington. The data is from 2016.
› Import data (MT): European Commission/Traces
› Exports to the US (MT): GATS/USDA

Russian Federation

Source

The area data was compiled by FiBL based on the data of the following international certifiers:
› Bio.Inspecta, Frick, Switzerland, www.bio-inspecta.ch
› CERES-CERT, Frick, Switzerland
› Ekoagros, Kaunas, Lithuania
› Ecoglobe - Organic control and certification body, Yerevan, Republic of Armenia, www.ecoglobe.am
› LETIS, Rosario, Santa Fe, Argentina
› Organic Standard, Kyiv, Ukraine
› Organización Internacional Agropecuaria (OIA), Buenos Aires, Argentina (2019 data)

Market data (retail sales): Prusso, Giuseppe (2019): Il Mercato die Prodotti Bio nella Federazione Russa. Presentation by Prusso, Giuseppe of the Italian Trade Agency at Sana, Bologna, September 6, 2019
Exports (MT)) to EU and USA: European Commission/Traces, USDA

Note

A direct year-to-year comparison over the years is not possible as not all certifiers provide updates every year and as certifiers are added that were not included previously.

Rwanda

› Area and operators: Certifier data.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Saint Lucia

Certifier data

Saint Pierre and Miquelon

› Area and operator data were not received.

Samoa

Source

› Area and operators: Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int
› Exports (MT)) to EU: European Commission/Traces

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

Sao Tome and Prince

Source

› Area and operators: Certifier data
› Exports (MT)) to EU: European Commission/Traces

Saudi Arabia

Source

› Area and operators: Department of Organic Agriculture (DOA), http://moa.gov.sa/organice/portale
› Exports (MT)) to EU: European Commission/Traces

Contact

› Eng. Ayman Saad Al-Ghamdi, General Manager of Organic Agriculture Department (DOA), Saudi Arabia
› Raed Saleh Almusaylim; Manager of Control & Legislation Section, Department of Organic Production, Riyadh, Saudi Arabia

Senegal

Sources

Area and operators:
› Kiwa BCS, Nürnberg, Germany, www.bcs-oeko.de
› CERTISYS, Bolline, Belgium, www.certisys.eu
› Ecocert, Ouaga, Burkina Faso, www.ecocert.com

Exports (MT)) to EU: European Commission/Traces

Note

No updated data had been received from the National Federation for Organic Agriculture, Thiès, Sénégal, and their data were removed, with the exception of the number of producers, as the certifiers only provided the number of companies/projects/certificates.

Serbia

Source

› Area and operators: Ministry of Agriculture, Forestry and Water Management, Belgrade, Republic of Serbia and Eurostat database, Eurostat, Luxembourg
› Export (2016) and import value (2012): Ministry of Agriculture, Forestry and Water
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Jelena Milic, Ministry of Agriculture, Forestry and Water Management, Belgrade, Republic of Serbia

Seychelles

› Area and operators: Certifier data

› Exports (MT)) to EU: European Commission/Traces

Sierra Leone

› Area and operators: Certifier data.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA
Please note that one certifier combined the area for cocoa and coffee; FiBL made an estimate of how much of this area was for coffee and how much for cocoa.

Singapore

› Area and operators: Certifier data.
› Exports (MT)) to EU: European Commission/Traces

Slovakia

Sources

› Area, operators, livestock, and crop production (2020): Eurostat database, Luxemburg
› Market data (2010): Ecozept, market research and marketing consulting agency. Freising, Germany
› Import data (MT): European Commission/Traces

Slovenia

Sources

› Area, operators, livestock, crop production (2020): Eurostat database, Luxemburg
› Retail sales (from 2103): Institute for Sustainable Development, Ljubljana, Slovenia
› Marketing channels (from 2009): Institute for Sustainable Development, Ljubljana, Slovenia
› Export and import values (in Euros) are from 2009: Institute for Sustainable Development, Ljubljana, Slovenia
› Import data (MT): European Commission/Traces

Solomon Islands

Source

› Area and operators: Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int
› Exports (MT)) to EU: European Commission/Traces

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

Somalia

› Certifier data.
› Exports (MT)) to EU: European Commission/Traces

South Africa

Sources

Area and operators
› CERES-CERT, Frick, Switzerland
› Control Union, Zwolle, The Netherlands, www.controlunion.org
› Ecocert South Africa, Stellenbosch, South Africa
› Kiwa BCS, Nürnberg, Germany, www.bcs-oeko.de
Exports (MT)) to EU and USA: European Commission/Traces, USDA

Spain

Sources

› Area and land use, operators: Eurostat database, Eurostat, Luxembourg
› Retail Sales, export and import value: Ministerio de Agricultura, Pesca y Alimentación (2021) Análisis de la caracterización y proyección de la producción ecológica española en 2020. MAPA, Madrid
› Import data (MT): European Commission/Traces
› Exports (MT) to the US: GATS/USDA

Contact

› Pedro López, Pro-Voc-Association, Madrid, Spain, www.provotec.es

Sri Lanka

Source

Area and operators (not from all certifiers updates were received):
› Control Union, Zwolle, The Netherlands, www.controlunion.org
› Ecocert India, Aurangabad, Maharashtra, India, www.ecocert.com
› MAYACERT, Guatemala City, Guatemala
› NCO, Stirling Australia
Onecert, Mansarovar, Jaipur, India, www.onecert.com
Export value (from 2015): Lanka Organic Movement
Exports (MT)) to EU and USA: European Commission/Traces, USDA

Sudan (former)

› Area (wild collection): Certifier data
› Exports (MT)) to EU: European Commission/Traces

Suriname

› Area: Certifier data
› Exports (MT)) to EU: European Commission/Traces

Sweden

Sources

› Area, livestock and operators: Eurostat database, Luxembourg
› Market data: Ekologiska Lantbrukarna, Ekomatcentrum och Organic Sweden (2022) Ekologiska Årsrapporten 2021. Stockholm. https://www.ekolantbruk.se/rapporter?search=%C3%85RSRAPPORT
› Import data (MT): European Commission/Traces
› . Exports (MT) to the US: GATS/USDA

Switzerland

Sources

› Land area and crop data, producers: Federal Agency for Statistics (BfS), Neuchatel, Switzerland.
› Processors: Bio Suisse, Basel, Switzerland
› Retail sales: Bio Suisse, Basel, Switzerland, www.biosuisse.ch/de/bioinzahlen.php.

Contact

› Helga Willer, FiBL, Frick, Switzerland

Syria

› Area or operator data were not received-
› Exports (MT)) to EU: European Commission/Traces

Taiwan

Source

› Area and operators: Agriculture and Food Agency, Council of Agriculture, Executive Yuan, R.O.C. Taiwan. Available at https://info.organic.org.tw/category/english/statistics/
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Tajikistan

Area and operators: Certifier data. Data on organic cotton from the Textile exchange were added.

Tanzania

Sources

Area
› Bioinspecta, Frick Switzerland
› CERES-CERT. Frick, Switzerland
› Control Union, Zwolle, The Netherlands
› Ecocert Southern Africa, Stellenbosch, South Africa
› Textile Exchange
Producers (2013): Tanzania Organic Movement (TOAM)
Exports (MT)) to EU and USA: European Commission/Traces, USDA

Note

› Please note that a direct year-to-year comparison is not possible for Tanzania due to the changing data sources.

Thailand

Source

› Area, producers, retail sales: Green Net Survey among the international and domestic certifiers; Green Net, 10330 Bangkok, Thailand. Domestic market and international trade data are from 2014.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Vitoon Panyakul, Green Net, 10330 Bangkok, Thailand, www.greennet.or.th.

Timor-Leste

› Area and operators: Certifier data.
› Exports (MT)) to the USA: USDA

Togo

Sources

Area and operators: The data was compiled by FiBL based on the data of the following international certifiers.
› CERES-CERT-Frick, Switzerland
› CERTISYS, Bolline, Belgium, www.certisys.eu
› Ecocert, Ecocert West Africa, Ouagadougou, Burkina Faso, www.ecocert.com
›OneCert international, Jaipur, India
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Tonga

Source

› Area and operators (2019): Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

Tunisia

Source

› Area and operators : Direction Générale de L'Agriculture Biologique (DGAB), Tunis, Tunisia
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Samia Maamer Belkhiria, Direction Générale de L'Agriculture Biologique (DGAB), Ministry of Agriculture and Hydraulic Resources, Tunis, Tunisia

Turkey (Türkiye)

Source

› Area and operators: Ministry of Agriculture and Forestry, Ankara, Turkey, and Eurostat database, Eurostat, Luxembourg
› Market data (2014): USDA Foreign Agricultural Services (2016): Turkish Organic Market Overview. USDA, Washington, USA.
› Export and import values (2017): Ministry of Agriculture and Forestry, Ankara, Turkey
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Elif Bayraktar Öktem, Republic of Turkey Ministry of Agriculture and Forestry, Ankara, Turkey

Uganda

Sources

Area and operators: Bonabana et al. (2022): Organic Agriculture Statistics in Uganda. Makerere University, Kampala, Uganda
Exports (MT)) to EU and USA: European Commission/Traces, USDA

Ukraine

Sources

›Area and operator data: Ministry of Agrarian Policy and Food of Ukraine, Kyiv, Ukraine
› Crop data: The data from the Ministry, which provided data on four major crops (grain maize, soybeans, sunflower, wheat), were supplemented with crop data from several international certifiers.
›Domestic market (2021): Organic.Info, Kyiv, Ukraine, https://organicinfo.ua/en/about-us/ (Data excludes retail sales of imported products)
› Exports (MT)) to EU and USA: European Commission/Traces, USDA; Total exports: Organic.Info

Infographics

› Infographics with data are available at https://organicinfo.ua/en/infographics/

Contact

› Hanna Voitiuk, The Ministry of Agrarian Policy and Food of Ukraine

United Arab Emirates

Source

› Area and operators: Ministry of Environment and Water (MOEW), United Arab Emirates. Crop details from certifiers
› Exports (MT)) to the USA: USDA

United Kingdom

Sources

› Land use details/crops/operators: DEFRA, London UK
› Market data: Soil Association (2022): Organic Market Report 2021. Soil Association, Bristol.
›Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contacts

› Lee Holdstock, Soil Association, Bristol, UK

United States of America

Source

› Land area and producers (2019): United States Department of Agriculture, Washington, USA.
› Market data: Organic Trade Association (OTA), Washington D.C., USA
› Export and import data: GATS, USDA, Washington, USA
› Exports (MT)) to EU: European Commission/Traces

Uruguay

› Area and operators: Certifier data
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Uzbekistan

› Area and operators: Certifier data and Textile Exchange, https://textileexchange.org/
› Exports (MT)) to EU: European Commission/Traces

Vanuatu

Source

› Area and operators: Pacific Organic and Ethical Trade Community (POETCom), Suva Fiji, www.spc.int
› Exports (MT)) to EU: European Commission/Traces

Contact

› Karen Mapusua, Secretariat of the Pacific Community (SPC), Suva Fiji, www.spc.int

Venezuela

Area and operators: Certifier data.
› Exports (MT)) to USA: GATS/USDA

Viet Nam

Sources

› Area and operators: Vietnam Organic Agriculture Association, Hanoi, Vietnam.
› Exports (MT)) to EU and USA: European Commission/Traces, USDA
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Note

› Please note that for the area and operator numbers, some PGS figures were included.

Contact

› Nguyễn Thị Hồng Ngọc, Vietnam Organic Agriculture Association, Hanoi, Vietnam

Yemen

› No area or operator data was received.
› Exports (MT)) to the USA: USDA

Zambia

Source

› Area and operators: Ecocert South Africa, Stellenbosch, South Africa
› Exports (MT)) to EU and USA: European Commission/Traces, USDA

Contact

› Daniël Kotzé, Ecocert South Africa, Stellenbosch, South Africa

Zimbabwe

Source

› Area and operators: Ecocert South Africa, Stellenbosch, South Africa
› Exports (MT)) to EU: European Commission/Traces

Contact

› Daniël Kotzé, Ecocert South Africa, Stellenbosch, South Africa

Note

› Please note that data from other sources (data from before 2019) were removed from the database back to 2009 as they were not confirmed, and it was not clear if there were duplications with the data from the certifiers

Annex III: About the FiBL Survey

In total, data were provided by more than 200 experts. Governments, private sector organizations, certifiers and market research companies have contributed to the data collection effort.

Several international certifiers deserve special mention as they provided data on several countries: ACO Certification, Bioinspecta, CCPB, CERES-CERT, Certisys, Control Union, Ecocert, Mayacert, Ecoglobe, Ekoagros, ICEA, Imocert, Kiwa BCS Oko-Garantie GmbH, LETIS, NASAA Certified Organic (NCO), Organic Agriculture Certification Thailand (ACT), Organización Internacional Agropecuaria (OIA), OneCert and Quality Certification Services (QCS).

Our collaboration with the Inter-American Commission for Organic Agriculture (CIAO) eased data collection in Latin America and the Caribbean substantially. Data from the Mediterranean countries were supplied by the Mediterranean Organic Agriculture Network (MOAN, c/o Mediterranean Agronomic Institute of Bari). Data from the Pacific Islands were provided by the Pacific Organic and Ethical Trade Community (POET.com). Another important source covering many countries is Eurostat. A list of all data sources and contacts is provided in the annex.

Countries covered

Data from 190 countries/territories were available, including area, producers and other operators, production, retail sales, international trade, livestock and further indicators. Updated data was not available for all countries/territories. For the countries/territories for which FiBL compiles the data among (often several) certifiers, not all of them provided updated data in all cases. When no new data was available, data from the previous survey were used.

Indicators covered

Data on the following indicators were collected:

- organic area and production including breakdown by crop;
- livestock numbers; production data (volumes and values);
- producers and further operator types;
- domestic market data (total retail sales and food service sales values and volumes,
- per capita consumption, share of the total market, and breakdown by product);
- international trade data (total import and export values and volumes, and breakdown by product).

Not all data that was collected is published in this book (e.g., production, livestock numbers, breakdown by product for the domestic market and international trade data) because it was not possible to draw a complete global picture for these indicators. More information about the data collection and analysis process is available in our metadata, which can be found on Organic Eprints https://orgprints.org/36848/.

Definitions/Explanations

Area: Data represents **certified organic land that is already fully converted as well as land under conversion** because many data sources do not separate or include the latter (for instance, Austria, Germany and Switzerland) and because land under conversion is under organic management. For a definition of organic agriculture, see the IFOAM – Organics International website.[1]

Area share of total agricultural land: In some cases, the calculation of the organic share of the total agricultural land or that of individual crops, which in most cases is based on FAOSTAT and in some cases the Eurostat data, might differ from the organic shares obtained from ministries or local experts.

Producer data: Some countries report the number of smallholders, while others report only the number of companies, projects, or grower groups, which may each comprise several producers. This applies in particular to many African countries. The number of producers is, therefore, probably higher than the number communicated in this report.

Retail sales data: It should be noted that for market and trade data, comparing country statistics remains very problematic due to differing methods of data collection. Furthermore, for market and trade values fluctuating exchange rates must be kept in mind.

Export/Import data: For exports and import volumes FiBL used its own classification. It is working on the harmonisation with the EU and US classification.

PGS: For some countries, areas certified by Participatory Guarantee Systems (PGS) have been included as the data providers did not make the distinction between third-party and PGS certification. (For more information about PGS, see the article by Anselmi and Moura e Castro et al. on page 157).

Country definitions: For countries and territories, the FAO country list is used. Where the designation "country" appears in this report, it covers countries or territories. In most cases, countries are groups by region according to the Standard Country and Area Classifications as defined by the United Nations Statistics Division.

Sources: Data was gathered from private sector organizations, governments, and certification bodies. For detailed information on the data sources, please check the annex at the end of this volume (page 338).

Direct year-to-year comparison: A direct year-to-year comparison is not possible for all data, as the data sources may change, data may not be provided on an annual basis, data may have been revised or corrected due to improved data access, or exchange rates might change from year to year.

Completeness of data: For some countries, either no current data were available, or the data provided may not be complete. For others, no data were available. It may, therefore, be assumed that the extent of organic agriculture is larger than documented in this publication.

Data revisions: Data revisions and corrections are communicated at statistics.fibl.org.

Metadata: Metadata for the FiBL survey on organic agriculture worldwide are available on Organic Eprints at https://orgprints.org/36848.

[1] The definition of organic agriculture is available at the website of IFOAM – Organics International www.ifoam.bio/en/organic-landmarks/definition-organic-agriculture