# Sustainable soy for a responsible supply of compound feed

Let's work today to safeguard tomorrow's resources





Companies in the animal feed sector recognize the responsibility they have in the sustainable production of the products they sell or process. The industry is involved and is exploring and intensifying its efforts towards more responsible practices to meet the demand for competitive, high quality, safe and healthy products, but through increasingly efficient and environmentally friendly processes. The great challenge continues to be for sustainability to improve our competitiveness, allow us to reach new markets and facilitate greater sustainable growth, efficiently managing existing resources.

In this sense, it is essential to carry out an analysis of the current situation with sustainable supply, focused on soy as a strategic raw material used by the compound feed industry in Spain. For this reason, as a commitment of the sector, CESFAC, as the Spanish Feed Manufacturers Confederation and the CESFAC Foundation, have undertaken a new project that reflects the clear desire of the industry to anticipate the future of sustainable soy.

The project presented below would not have been possible without the collaboration and effort of many organizations, companies, business associations, administrations and institutions that have supported this initiative, highlighting in particular the financial support of IDH (Sustainable Trade Initiative), the work resources generously contributed by the CESFAC Foundation and the leadership of the General Sub-Directorate of Livestock Production Means of the Ministry of Agriculture, Fisheries and Food.

President of CESFAC Mr. Fernando Antúnez President of the CESFAC Foundation
Mr. Josep Jové

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This study has been carried out by the CESFAC Foundation with the financial support of IDH (Sustainable Trade Initiative), within the framework of the SOY PROGRAM, CO-FUNDING AGREEMENT 203521.

This collaboration between the CESFAC-IDH Foundation has made it possible to carry out an analysis of the current situation regarding the responsible supply of soy used by the industry for the manufacture of animal feed in Spain. The results of this work have made it possible to draw valuable conclusions for the industry that will lay the foundations for the acceptance of responsible soy in Spain and the transition towards sustainable sourcing, aligning efforts with the links involved in the value chain to promote awareness sector of progress towards a sustainable production model.

The **Spanish Feed Manufacturers Confederation (CESFAC)** is a non-profit professional organization that integrates and represents the interests of associated manufacturers and the animal feed sector in general, before public

administrations and before third parties. In addition, we are the only representative of the sector before the European Feed Manufacturers' Federation (FEFAC), before the Spanish Federation of Food and Beverage Industries (FIAB) and before the Spanish Interprofessional of Animal Nutrition.

The **CESFAC Foundation** is a non-profit organization that includes operators related to animal nutrition and food in general. Within this Foundation and as promoters and collaborators, there is room for companies and organizations of all kinds that aim to improve and support with their efforts the development and excellence of the food chain, with particular attention to the first links in it.

**IDH, The Sustainable Trade Initiative** is a social enterprise that works with companies, funders, governments and civil society to carry out sustainable trade in global value chains. Action-driven coalitions will drive impact on the Sustainable Development Goals and create value for all.

#### **ACKNOWLEDGEMENT**

Our thanks to the Organizations that have collaborated in this study:









INTERAL, Spanish Interprofessional Organization of Animal Nutrition. AFOEX, National Association of companies for the Promotion of Oilseeds and their Extraction.

CIARA-CEC, Chamber of the Oil Industry of the Argentina Republic-Cereal Export Center. FEFAC, European Feed Manufacturers' Federation.

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#### **Abbreviations**

Abbreviation	Meaning	Abbreviation	Meaning
ARS	Amaggi Responsible Standard	IDH	The Sustainable Trade Initiative
CESFAC	Spanish Feed Manufacturers Confederation	IPCC	Intergovernmental Panel on Climate Change
COCERAL	European association representing the trade of cereals, rice, feedstuffs, oilseeds, olive oil, oils and fats and agrosupply	ISCC	International Sustainability and Carbon Certification
		ITC	The International Trade Centre
CO <sub>2</sub>	Carbon dioxide	LDC	Louis Dreyfus Company
COVID	COVID-19 is the disease caused by a new coronavirus called SARS-CoV-2  European Union	ONGs	Non-governmental organisations
EU		R+D	Research and Development
FAO	Food and Agriculture Organisation of the	RTRS	Round Table on Responsible Soy
TAO	United Nations	SDG	United Nations Sustainable Development Goals
FEDIOL	EU vegetable oil and proteinmeal industry association	SSAP	Soy Sustainability Assurance Protocol
FEFAC	European Feed Manufacturers'Federation	TARIC	Taric code or tariff heading associated to each good depending on its nature. It is used in the EU
FEFAC SSG	FEFAC Soy Sourcing Guidelines	TFUE	Treaty on the Functioning of the European Union
		TRASE	Transparency for Sustainable Economies
FIAB	Spanish Federation for Feed and Drinks Industries	UN	United Nations
GEF	Global Environmental Facility	UN COMTRADE	Database for international trade statistics of the United Nations
IDB	Inter-american Development Bank	USA	United States of America
IDB-INVEST	Investment mechanism of IDB	ViSeC	Sectorial Vision of the Argentinian Gran Chaco (ViSec)

#### **About this report**



This report presents a **study on the origin and characteristics of the soy used** by the animal feed manufacturing industry in Spain in relation to sustainability, as well as an **analysis of the current situation** in the adoption of **programmes dedicated to sustainability**, together with some **recommendations** for the sector.

Its main goal is to analyse the existing information regarding the import of soy from Brazil and Argentina to Spain in order to discover the environmental impact at its origin, identify the initiatives that have been introduced to reduce it in the different areas and determine the percentage of soy that may be classified as sustainable in relation to the total amount imported.

This estimation is highly relevant for such an important industry that deals with the challenges in the feeding of humanity. As such, it must be understood from several meanings. On the one hand, **a better understanding of the current situation, extracting valuable conclusions** for the industry and its transition towards sustainability; on the other hand, **valuing the commitment of different links** of the sector, from production, commercialisation, transformation, distribution and consumption **towards a better awareness and internal and external communication.** 

The results of this study, prepared from details compiled for the 2016-2018 three-year period, analysing the positive impact of the main initiatives and sustainable production programmes, allow for

the establishment of the amount of imported soy that these good practices refer to, from which territories they are being applied and which are the standards of reference in the sector.

Together with the analysis of the production model and of the progress of the businesses at the outset towards the ambitious goal: reduce deforestation, the information emerging from the study has been confirmed with the stakeholders, specifically with the manufacturers of feed, to know their perspective and view of sustainable soy, in addition to identifying the most important tendencies in terms of European policies of sustainability.

This comparison of perspectives allows for the detection of improvement points for the generation of recommendations, useful for better aligning the efforts of the links of the value chain, promoting a sector-wide awareness and collaboration to enhance the advance towards a production and management model that is not only sustainable but also prosperous for people and the planet.







Soy, a source of protein energy.



#### Introduction

As a result of two basic circumstances in the last two decades at a global level: the growth of income and the changes in consumer preferences, the consumption of foodstuffs has been growing at a faster rate than that of the global population.

This increase in demand has been addressed with an increase in the size of the area being harvested, the improvement of the efficiency in the means of production and the prioritisation of specific crops that had better value within the global supply chains.

Among these crops, four stand out due to their great global relevance: rice, wheat, corn and soy.

**Soy** (Glycine max) is a yearly leguminous fabaceous plant whose production interest is due to its edible bean. Humans have grown this plant for thousands of years in Asia where it is originally from and during the last century it has expanded in a marked way to other regions of the world. Its great market value is based on its nutritional density as a source of proteins and energy: the

protein content of soy varies from 38% in the whole bean to up to 90%<sup>1</sup> in the isolated protein.

The main sub-products obtained from soy are soy oil and soybean meal. Soy is mainly used as a raw material for feed used for feeding livestock, as a result of its beneficial relationship between nutritional elements and price.

Its uniqueness comes from the **exceptional energy and protein contribution** (specifically from the essential aminoacid lysine) at a cheaper cost than other products, such as fish soybean meal. Additionally, soy contains relevant amounts and a high bio-availability of other essential nutrients, such as linoleic acid and choline.

These privileged characteristics make soy the most efficient medium-term alternative in confronting the challenges related to animal feeding.

he continued increase in demand has caused global **production** of soy to multiply exponentially in recent decades, reaching more than 100 million hectares of crops,

Source: Fundación FEDNA <a href="http://www.fundacionfedna.org/ingredientes\_para\_piensos/haba-de-soja-tostada-o-tratada-en-seco-actualizado-nov-2011">http://www.fundacionfedna.org/ingredientes\_para\_piensos/haba-de-soja-tostada-o-tratada-en-seco-actualizado-nov-2011</a>





specifically located in the United States (USA) and South America (which has 45 million hectares). Only three countries in the world account for 80%<sup>2</sup> of the 353 million tonnes of annual soy production: USA, Brazil and Argentina. Currently, it is the main crop in Argentina and Brazil, both in terms of production volume, as well as surface occupied.

In Argentina, soy represents around 55% of the almost 37 million hectares that are planted, followed at a distance by the crops of corn and wheat, which, together, represent 26%. A similar phenomenon occurs in Brazil where, out of the 65 million hectares for planting, almost 50% is used for soy<sup>3</sup>.

This increase of production has placed greater pressure on natural resources in the main producing countries.

In terms of commercialisation, it deals with a product with a high commercial interest, as 40% of the yearly production is directly commercialised. This means that it is considered to be a relevant crop for the commercial drive.

This commercialisation is mainly done as soy grain, which is chiefly imported by China and the European Union (EU), and as oil and soybean meal, products of greater added value.

#### Uses that sustain the increase in demand

The majority of soy produced is used to make soy soybean meal (rich in proteins), as well as vegetable oil and sub-products such as lecithin, a natural emulsifier. The soybean meal is mainly used as livestock feed. Soy oil is used in products for human consumption and other consumer goods, such as cosmetics and soaps, and as bio-fuel.

The demand for proteins has increased substantially in recent years and shall continue to do so in the next decade. Population increase, the development of many countries and the new demands of emerging countries in terms of food, are some of the factors that lead to it. The animal feeding sector guarantees the supply of feed for livestock ranches and, with this, the supply of food for the population.

<sup>&</sup>lt;sup>2</sup> Source: INTA Statistical report on the soy market https://inta.gob.ar/sites/default/files/inta\_informe\_estadistico\_del\_mercado\_de\_soja.pdf

<sup>&</sup>lt;sup>3</sup> Source: INTA Statistical report on the soy market https://inta.gob.ar/sites/default/files/inta\_informe\_estadistico\_del\_mercado\_de\_soja.pdf

Around 75% of the soy in the entire world is used for animal feed, particularly for poultry and pigs. Between 1961 and 2018<sup>4</sup> the production of pork increased 388%, the production of beef increased 149% and poultry 1,323%.

As the main source of feed for animals in the world, soy is a key component in the industrial agriculture model that has allowed for lower prices and greater efficiency in production.

It is expected that soy production will continue to grow rapidly, in line with the economic development that leads to greater consumption of animal protein, particularly in developing and emerging countries. The recent projections of the Food and Agriculture Organization (FAO) suggest an increase that may reach 406.2 million tonnes by 2029<sup>5.</sup>

This phenomenon has already been observed in countries with a strong development in the last 20 years, as is the case of China, whose soy consumption, exclusively used for animal feed, increased 374%, going from 2.01 million tonnes in 2000 to 9.53 million in 2013, and the majority of this was imported.

# Consumer data in Spain

The animal feed sector is highly dependent on raw materials from abroad. As a leading power in feed production in the EU (in 2018 the total production of feed in Spain reached 36,988,316 tonnes) and lacking in national raw materials, **Spain must turn to external markets in order to supply the cereals and proteins necessary for the preparation of feeds.** 

According to the information of the foreign trade database of the Spanish Chamber of Commerce<sup>7</sup>, with 5.9 million tonnes of soy (in the form of seeds, cakes or soybean meal and oil) imported in 2017, Spain was, after the Netherlands, the second country in the EU for the importation of soy. The Spanish importation of this raw material was 18% of the total for soy importation in the 27 EU countries. During 2017<sup>8</sup>, 40% of Spanish importation came from Brazil, 32% from Argentina, 16% from the USA and the remaining 12% from other countries.

The demand for proteins has increased substantially in recent years and shall continue to do so in the next decade.



<sup>&</sup>lt;sup>4</sup> Original source FAO, represented by Our World in Data at: Meat production by livestock type (1961-2018) https://ourworldindata.org/grapher/global-meat-production-by-livestock-type?time=earliest..latest

<sup>&</sup>lt;sup>5</sup> FAO SoyBean Projections <a href="https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections">https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections</a>. <sup>9</sup> 9502660d-en | <sup>6</sup> Original source FAO, represented by Our World in Data at: Soybeans: are they used for food, feed or fuel? China (2000-2013) <a href="https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections">https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections</a>. <sup>9</sup> 9502660d-en | <sup>6</sup> Original source FAO, represented by Our World in Data at: Soybeans: are they used for food, feed or fuel? China (2000-2013) <a href="https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections">https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections</a>. <sup>9</sup> 9502660d-en | <sup>6</sup> Original source FAO, represented by Our World in Data at: Soybeans: are they used for food, feed or fuel? China (2000-2013) <a href="https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections">https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections</a>. <sup>9</sup> 9502660d-en | <sup>6</sup> Original source FAO, represented by Our World in Data at: Soybeans: are they used for food, feed or fuel? China (2000-2013) <a href="https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections">https://www.oecd-library.org/agriculture-and-food/world-oilseed-projections</a>. <sup>9</sup> 9502660d-en | <sup>6</sup> Original source FAO, represented by Our World in Data at: Soybeans: are they used for food, feed or fuel feed or fuel feed or food, feed or fuel feed or feed or







In 2018 (the last full year with definitive data at the time of the editing of this report), the total amount imported was 5.7 million tonnes, 43% of this originated in Brazil, 22% in Argentina and the USA increased to 26%.

The total of importation to Spain comes from six different products, according to their TARIC<sup>9</sup> code:

- Soya beans, whether or not broken | 1201 10 00
- Soya beans, other than seed, whether or not broken | 1201 90 00
- Flours and meals; of soya beans | 1208 10 00
- Vegetable oils; soya bean oil and its fractions, crude whether or not degummed, but not chemically modified | 1507 10
- Vegetable oils; soya bean oil and its fractions, other than crude, whether or not refined, but not chemically modified | 1507 10 90
- Oil cake and other solid residues; whether or not ground or in the form of pellets, resulting from the extraction of soya bean oil | 2304 00 00

In accordance with the soy **product** imported from Brazil, it is mainly beans and seeds that are imported (TARIC code 1201) (78% both in 2017 and 2018), while from Argentina

it is imported almost exclusively in cake form (96% in 2017 and 100% in 2018). The importations from the USA are mainly beans and seeds (87% in 2017 and 81% in 2018).

In terms of the **country of origin**, the beans and seeds mainly come from Brazil (58% in 2018 and 50.5% in 2019), according to data from UN COMTRADE<sup>10</sup>, while the USA represents 33.2% in 2018 and 41.2% in 2019. It must be highlighted that since 2015, the USA has notably increased its exportation percentage of beans and seeds.

Regarding soy cake, its main origin is Argentina, with 59.7% in 2019, while Brazil accounts for 26.5% and the USA 5.8%.

In terms of the **total amount imported** by Spain, in 2017 the amount of soy beans and seeds and cake reached 98.2% and, in 2018, it was 97.8%. As such, the other products have an anecdotal weight within these importations.

87% of the soy imported by the EU is used for the production of feed for livestock. As mentioned before, Spain is the leading manufacturer of compound feeds in the EU, finding itself in the top ten manufacturing countries in the world. In 2018, Spain was the leader in feed production in the EU, producing 37 million tonnes,

<sup>9</sup> TARIC code or tariff issue: code associated with every good in terms of its nature. Used throughout the world to classify international shipments, calculate taxes, tariffs and possible restrictions that may apply.

<sup>10</sup> UN COMTRADE: https://comtrade.un.org/

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#### Sustainability in the soy production sector



Spain leader in production feed in the EU.

which means an increase of 5% on the data obtained in 2017 (35,231,510 tonnes)<sup>11</sup>.

10% of the raw material used for the manufacture of feed comes from soy, both in the form of soybeans as well as soybean meal, according to the data collected in the report prepared by the Ministry of Agriculture, Fisheries and Food<sup>12</sup>. Together, they amount to 4.1 million tonnes in 2018, approximately 70% of the soy imported by Spain that year.

In terms of soy crops in Spain, it should be indicated that, in 2018, 1,481 hectares were dedicated to its production, creating almost 4,250 tonnes, which represents less than 1/1,000 of the total consumed in our country (data from FAOStat)<sup>13</sup>.

# Challenges associated with growing soy

As a result of the increase in the production area of soy, millions of hectares of forests, prairies and savannahs have been converted for agriculture, whether directly or indirectly, in the main producing countries.

This conversion is defined as the "Change from a natural eco-system to other land use or a profound change in the composition, structure or function of the species of an eco-system. This includes severe degradation or the introduction of management practices that produce a substantial and sustained change in the composition, structure or function of the previous species of the eco-system. Deforestation is a type of conversion (conversion of natural forests)" according to the Accountability Framework<sup>14</sup> and its Terms and Definitions document.

In the same document, **deforestation** is defined as: "The loss of natural forest as a result of: i) conversion to agriculture or another land use that is not forestry; ii) conversion to a tree plantation; or iii) its serious and sustained degradation".

Deforestation not only removes the vegetation that is important for the absorption of carbon dioxide (CO<sub>2</sub>) in the air; the reduction of the forests also causes greenhouse gas emissions. FAO states that deforestation is the second leading cause of climate change, the first being the use of fossil fuels.

In fact, the Intergovernmental Panel on Climate Change (IPCC) $^{15}$  estimates that up to 25% of all the  $\rm CO_2$  absorption in the atmosphere is done by forests. At the same time,

<sup>11</sup> Data for feed production in Spain 2018. Ministry of Agriculture, Fisheries and Food <a href="https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018">https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018</a> tom30-512133.pdf | 12 Report on the Data for feed production in Spain 2018. Ministry of Agriculture <a href="https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018">https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018</a> tom30-512133.pdf | 13 Visit FAOStat <a href="https://www.fao.org/faostat/es/#data/QC">https://www.fao.org/faostat/es/#data/QC</a> | 14 The Accountability Framework was created by means of a consultation process with a wide range of actors, including businesses, NGOs and governments and following the good practices applicable for initiatives in which multiple actors participate. Source: Terms and Definitions https://s30882.pcdn.co/wp-content/uploads/2020/06/Definiciones-v2.1.pdf</a> | 15 https://archive.ipcc.ch/

when the forests or other eco-systems suffer disturbances and the plants die, the vegetable material decomposes or is burnt and the CO<sub>a</sub> is released into the atmosphere. The IPCC estimates that between 10 and 20% of all the CO<sub>2</sub> released comes from changes in the use of soil and, specifically, in the degradation and loss of tropical forests<sup>16</sup>.

It is estimated that since 1990, 420 million hectares of forest have been lost on a global level, because of the changes in land use, despite the rate of deforestation decreasing in the three decades<sup>17</sup>. If the demand for surface continues growing, in line with the predictions, there is a risk of losing natural eco-systems, unless increasingly more urgent measures are taken.

As a result of this, all the actors in the chain have started to contribute to the transition towards a more responsible soy industry, including the sectors of production, commercialisation, transformation and distribution involved, as well as the financial institutions of the investments, governments of producing and importing countries, NGOs and consumers.

#### Forestry regulations and initiatives

The establishment of Forestry Laws managed to reduce deforestation in certain regions of Paraguay, Brazil and Argentina in recent decades; undoubtedly, an important step forward in the protection of eco-systems. These advances have allowed for the reduction of endangered areas, minimising these to some specific areas, such as the eco-regions of the Argentina and Paraguayan Chaco Plain and the Brazilian Cerrado.

In 2006, the alarming loss of surface in the Amazon, in part due to the expansion of soy growth, led to the Amazon Soy Moratorium, an agreement between the main representative bodies of the producers and preservation associations, which the government of Brazil later joined. This moratorium meant the prohibition of the purchase of soy from recently-deforested areas and after successive delays in its application, it has been in force indefinitely since 2016.

As a result, it is estimated that the growth of soy has been responsible for just 1.8% of the deforested area of the Amazon since 2008.

Notwithstanding, and despite the fact that the protection of the Amazon area has had a notable repercussion, other indirect effects have occurred as a result of this moratorium. The expansion of the growth of soy in Brazil has been transferred to pasture areas, in order to avoid restrictions on deforestation, although this is greatly affecting another equally important biome for biodiversity: the Cerrado.

As a result, another initiative, the Cerrado Working Group has repeated its efforts in the Amazon to stop illegal deforestation, managing, in 2017, that just 7% of the crops created in the area of the Cerrado were linked to deforested areas.

This risk, the fact that they are creating new areas of soy production in other regions of the country, given the impossibility of focusing it on the Amazon or the Cerrado, has led to illegal deforestation associated with soy production in Brazil not being eradicated entirely. According to data from Transparency for

<sup>16</sup> Summary guide of the Special report by the IPCC on climate change and land use. Ministry for Ecological Transition https://www.miteco.gob.es/es/cambio-climatico/temas/impactos-vulnerabilidad-y-adaptacion/guia-informe-especial-ipcc-usodelatierra tcm30-504679.pdf

<sup>&</sup>lt;sup>17</sup>FAO. The state of the World's Forests 2020 http://www.fao.org/publications/card/en/c/CA8642ES

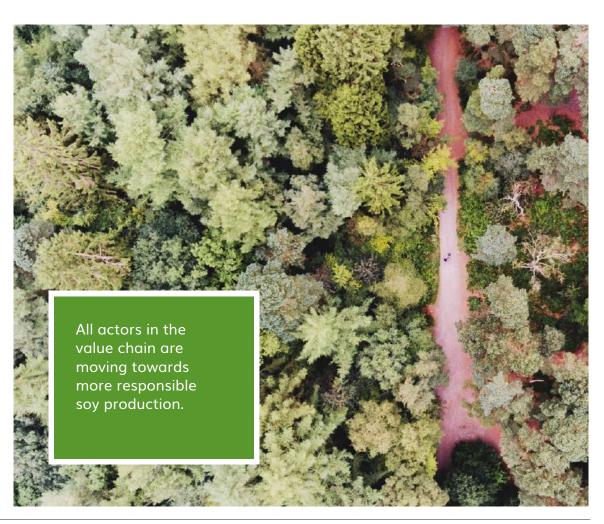
#### **←**

#### Sustainability in the soy production sector

Sustainable Economies (TRASE), it is estimated that 19% of soy imported from Brazil to the EU in 2018 came from areas in danger of illegal deforestation.

In **Argentina**, the problems linked to deforestation for the growth of soy were located in the Gran Chaco biome. **The Visión Sectorial del Gran Chaco Argentino** ("Sectorial Vision of the Argentina Gran Chaco") (ViSeC)<sup>18</sup> was launched, a space for discussion encouraged by *The Nature Conservancy* and the Chamber of Agricultural Industry of the Republic of Argentina, which, in 2019, started to bring together the main production, processing and commercialisation companies for agricultural commodities with the aim of decreasing the environmental impact with a focus on deforestation and other means of changing soil use in the Argentina Gran Chaco Region. The main soy production and exportation businesses in Argentina have formed part of this initiative from the beginning, whose goals are detailed in relation to these five priorities:

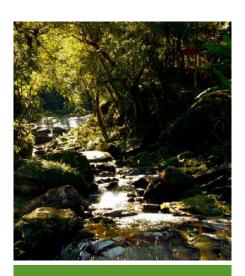
- Commitment to the export sector.
- Transparency and availability of information being key. for making decisions.
- Traceability and monitoring of the entire production and commercialisation chain.



<sup>&</sup>lt;sup>18</sup> Sectorial Vision of the Argentina Gran Chaco (ViSeC) Progress Report November 2020.

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#### Sustainability in the soy production sector



In 2021 the UN Decade for the restoration of ecosystems begins.

- Implementation of the commitments on the part of all the actors in the value chain.
- Visibility.

# Something more than deforestation

The changes of forest land use lead to, additionally, an important contribution in the form of greenhouse gas emissions, increasing the carbon footprint associated with soy production. These amount to nearly 36% of the total average emissions associated with soy produced in Brazil<sup>19</sup>, although in terms of the production area it reaches 50% (Cerrado). The other great proportion, approximately another 35%, is linked to transport, both internal and transnational, although the first generates the most emissions, with 25% of the total.

According to a study in 2020<sup>20</sup>, the mark of the municipalities in the agricultural border in the biomes of the Cerrado and the Amazon are 2.5 times greater than the other regions, mainly, due to the change in land use.

As such, in terms of climate change, current soy produc-

tion has a greater negative impact through deforestation and changing soil in the production areas than its transport to the EU.

No wonder, in recent years, many of the initiatives associated with stopping deforestation are giving centre stage to the restoration of eco-systems in order not to erode their capacity for creating these eco-system services, among them **Decade**<sup>21</sup> stands out for the restoration of eco-systems of the United Nations (UN) that starts in 2021.

# Shared responsibility

Both the main soy exporting powers, such as the EU, the second biggest importer in the world, have already taken some steps to encourage more sustainable production models and contribute to reducing the risk of deforestation associated with soy.

Moving towards a model of environmentally and socially responsible supply is a task for all the parties involved. The key is: to collaborate and roll into one

 $<sup>^{19}\</sup> Escobar,\ N\ et\ al.\ \underline{https://www.sciencedirect.com/science/article/pii/S0959378019308623\#: \sim: text=Total\%20GHG\%20emissions\%20from\%20Brazilian,from\%20deforestation\%20in\%20absolute\%20terms$ 

<sup>&</sup>lt;sup>20</sup> Gil, J. Carbon footprint of Brazilian soy. Nat Food 1, 323 (2020). https://doi.org/10.1038/s43016-020-0106-x

<sup>&</sup>lt;sup>21</sup> Source: https://www.decadeonrestoration.org/types-ecosystem-restoration/forests

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mutual efforts and initiatives with a global vision, acting locally and within the scope of each one of the economic and institutional actors.

# Agenda 2030 as a reference framework and model for sustainable development

In 2015, the UN took the lead at a global level and launched Agenda 2030 as a compendium of goals and challenges that consisted of a roadmap towards a global model for sustainable development.

Within the 17 goals and 169 challenges outlined, three groups are mainly distinguished according to their main approach: Social, Economic and Environmental, although there are also goals focused on Peace and co-operation between the different agents involved.

The soy production sector shows close ties to the **SDG 13 and SDG 15.** 



Despite being an initiative aimed at government action, its ability to specify the different aspects linked to sustainability in goals and quantifiable challenges has made it a model that is widely adopted by the business sector.

In the five years since, the business sector has aligned its initiatives in terms of sustainability with the Sustainable Development Goals (SDGs)<sup>22</sup>, trying to contribute to achieving their goal through these ones. Because of this, the references to these goals have been expanded in sustainability strategies and reports, something in which the soy production sector has not been left behind in. The most recent documents prepared by the main soy production and importation businesses in the world show these Sustainable Development Goals which they are making their most relevant contributions to and regarding those that align their commitments to sustainability.

According to these 17 SDGs, even though the contribution may be made to any of these, it is mainly in those associated with environmental aspects where the sector may play a more relevant role. Among these, SDG 15 Life of Land Ecosystems stands out, due to the impact that deforestation has on their preservation. No wonder, some of the targets identified 2020 as the year in which

a sustainable management of the forest resources to put an end to deforestation and allow for the recovery of natural habitats should be addressed. Accordingly, from the UN, the Decade for the Restoration of Ecosystems (2021-2030) has been launched in order to prevent, stop and reverse the degradation of ecosystems all around the world.

SDG 13, Climate Action, also plays an important role, both for the emissions generated throughout the soy supply chain as well as the loss of carbon sinks that may cause the deforestation of forests and other natural ecosystems.

#### **EU Initiatives**

In spite of the COVID-19 pandemic, the European Union approved the **European Green Deal**<sup>23</sup> in May 2020. This initiative articulates a green and circular economic model to provide the EU with a sustainable and climatically neutral economy in 2050. Linked to the Green Deal are diverse strategies such as "Farm to fork" or the EU Biodiversity Strategy for 2030.

The "Farm to fork<sup>24</sup>" strategy aims to encourage a feeding system that is fair, healthy and respectful to the

<sup>&</sup>lt;sup>22</sup> The 17 Sustainable Development Goals <a href="https://www.un.org/sustainabledevelopment/es/">https://www.un.org/sustainabledevelopment/es/</a>

<sup>&</sup>lt;sup>23</sup> The European Green Deal https://eur-lex.europa.eu/legal-content/EN/TXT/?gid=1588580774040&uri=CELEX:52019DC0640

<sup>&</sup>lt;sup>24</sup> EU "Farm to fork" strategy https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal/actions-being-taken-eu/farm-fork es

«Farm to Fork», the strategy to develop a fair, healthy and environmentally friendly food system.



environment. To do so, it establishes different aims that commit to the entire food value chain, from production to the consumer, including the sector for the manufacturing and distribution of food and drinks.

In the EU Biodiversity Strategy for 2030<sup>25</sup>, conscious of the links that the supply chain of food and other resources towards the European countries has with other regions of the world, commitments are suggested that intend to contribute to the preservation of biodiversity in these regions.

It should be highlighted that both strategies address the need to minimise raw materials associated with deforestation to promote more sustainable supply chains. Notwithstanding, the EU has been working for more than a decade, proactively, on stopping deforestation on a global level, as can be seen in different initiatives linked to the reduction of global deforestation and specifically in the Report of the European Parliament with recommendations for the Commission regarding a legal framework for the Union to stop and reverse global deforestation encouraged by the European Union (2020/2006(INL)<sup>26</sup>) in June 2020.

Therefore, this document highlights that "approximately 80% of global deforestation is due to the expansion of

land used for agriculture; and points out in this context that the Notification of the Commission "To intensify the activity of the EU to protect and restore the forests of the world", of July 2019, recognises that the demand for certain basic products is a factor that leads to deforestation. On the other hand, it also indicates that "the preservation of the forests on a global scale and the prevention of its degradation are some of the greatest challenges of our time in terms of sustainability and overcoming them is essential to be able to reach the goals of the 2030 Agenda for Sustainable Development, the Paris Agreement and the Green Deal", at the same time it focuses on the fact that current policies may not guarantee the sustainable operation of the forests and ecosystems in many parts of the world.

The European Parliament's Committee on Environment, Public Health and Food Safety is currently working on a proposal for regulations that indicate that more ambitious measures should be taken to guarantee that it does not contribute to deforestation, with a stated goal: to guarantee a high level of protection for natural forests and natural ecosystems and the protection of human rights that may be affected by the exploitation, extraction and production of basic products. One

<sup>&</sup>lt;sup>25</sup> EU Biodiversity Strategy for 2030 <a href="https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal/actions-being-taken-eu/eu-biodiversity-strategy-2030\_es\_">https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal/actions-being-taken-eu/eu-biodiversity-strategy-2030\_es\_</a>

<sup>&</sup>lt;sup>26</sup> European Parliament Report https://www.europarl.europa.eu/doceo/document/A-9-2020-0179 ES.html







of its priorities is to reduce the global footprint associated with the production of animal feed in the EU and encourage the community consumption of products with supply chains free from deforestation. Regarding this, it suggests the obligation to allow due diligence, as one of the key ideas, by recognising the usefulness of third party audits, to assess the fulfilment of the established legal requirements and other risks identified in the supply chain.

This proposal also indicates that the certification and labelling handled by third parties are not efficient, by themselves, to avoid basic products and other products that cause risks to the forests and ecosystems being commercialised in the European Union single market. It assesses that the certification handled by third parties may only be complementary, but it cannot replace the detailed compulsory proceedings of due diligence that the companies should take, encouraging the transparency of the supply chains and guaranteeing their social and environmental responsibility, in accordance with the principle of "whoever pollutes, pays", one of the basic pillars of the environmental policy of the EU, considered in article 191 of the Treaty on the Functioning of the European Union (TFUE<sup>27</sup>).

# Commitments by the animal feed industry

The European Feed Manufacturers' Federation (FEFAC<sup>28</sup>) has invested resources in creating the most sustainable soy supply chain possible. Specifically, FEFAC started a roadmap in 2005 that led to the publication of the FEFAC Soy Sourcing Guidelines in 2015.

FEFAC highlights the significant progress made in transforming the European market into one of responsible soy since 2015, a year in which FEFAC, in collaboration with the International Trade Center (ITC)<sup>29</sup>, enabled the launch of the FEFAC reference system for the programmes for responsible soy sourcing. In fact, the internal FEFAC estimations show that 49% of all the use of soy soybean meal in industrial compound feeds in 2018 meets the criteria of the FEFAC Soy Sourcing Guidelines, a percentage higher than the 38% mentioned in the Monitor IDH 2018<sup>30</sup> Report, which covers the total consumption of soy in Europe.

This FEFAC reference system for responsible soy

<sup>&</sup>lt;sup>27</sup> Treaty on the Functioning of the European Union <a href="https://eur-lex.europa.eu/legal-content/ES/TXT/?uri=CELEX%3A12012E%2FTXT">https://eur-lex.europa.eu/legal-content/ES/TXT/?uri=CELEX%3A12012E%2FTXT</a> | <sup>28</sup> FEFAC – European Feed Manufacturers' Association <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustainable Trade Initiative (2020) <a href="https://www.intracen.org/">https://www.intracen.org/</a> | <sup>30</sup> European soy monitor IDH, The Sustai

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#### Sustainability in the soy production sector

sourcing programmes, prepared together with the ITC, sets the guidelines for FEFAC soy sourcing. The aim of these guidelines and the reference system created is to provide transparency to the soy operators interested in buying responsible soy and giving an incentive to suppliers and agricultural organisations to encourage responsible soy growth.

The guidelines established by FEFAC, as shall be detailed, in the section *Characterisation of sustainability applied to the production and consumption of soy for feed manufacturing,* are a professional recommendation aimed at enabling the efforts for the transition to sourcing responsible soy, which combines a series of minimum requirements related to good environmental, social and agricultural practices of soy production.

In 2019, the main animal feed manufacturing companies in the EU committed<sup>31</sup> to encouraging sourcing raw materials produced in a responsible way for animal feed of national origin and imported, covering all the stages of the agricultural supply chain. Included in its approach was the production of sustainable compound animal feeds in the EU, in line with the initiatives that FEFAC were already undertaking.

In May 2020, the *Joint position on how to accelerate action against deforestation* statement was published in which COCERAL<sup>32</sup>, FEDIOL<sup>33</sup> and FEFAC, representing the EU grain and oilseed trade, crushing and feed industry recognize the responsibility that they have in sustainable production of basic products that they commercialise or process. COCERAL, FEDIOL and FEFAC share their approaches regarding what is the most appropriate way to follow in order to achieve a sustainable transformation of the supply chains.

With the aim of efficiently addressing global deforestation, according to this statement, the efforts of the EU should be based not only on stopping the use of raw materials at risk of deforestation in Europe, but relying on the gradual application of goals and working on the commitments together with business as well as farmers, the local communities and the third party authorities.

Additionally, they show their support for establishing a regulatory framework for the EU aimed at accelerating, strengthening and including the voluntary efforts, already underway, towards the no deforestation and improving sustainability in the supply chain for raw materials.

FEFAC has been investing for years in the creation of a more sustainable soy supply chain.



<sup>31</sup> ITC Commitment https://sm.sustainable-trade.org/wp-content/uploads/2021/01/Update-11-December-2020.pdf

<sup>&</sup>lt;sup>32</sup> COCERAL – European association representing the trade of cereals, rice, feedstuffs, oilseeds, olive oil, oils and fats and agrosupply http://www.coceral.com/

<sup>33</sup> FEDIOL - The EU vegetable oil and proteinmeal industry association https://www.fediol.eu/



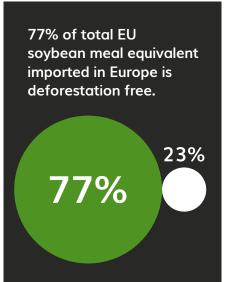
These initiatives are already providing results in terms of the risk to deforestation linked to the production of soy in recent years, both in the Amazon and in Cerrado; and they have been translated into an important increase in the volume of soy imported with a low risk of deforestation, which in 2018 was estimated at 81%<sup>34</sup>.

According to the document published by FEDIOL, 81% of soybeans and meals consumed in the EU bear a low risk of association to deforestation, due to their traceable origin, according to TRASE. In the same document, the estimations of FEFAC indicate that 77% of the total of soy imported into the EU is free from deforestation and the remaining 23% is exposed to the risk of deforestation.

#### Initiatives by the animal feed manufacturing industry in Spain

Spain has become the main producer of animal feeds in the EU. In 2018, the production of feed for production animals reached 36,081,934 tonnes, 97.5% of the total of feed produced.

<sup>&</sup>lt;sup>34</sup> Source FEDIOL: https://www.fediol.eu/data/soy-consumption%2023nov20.pdf





It has caused, as such, an increase of 5.2% in the feed produced for production animals (in 2017 there were 34,296,440 tonnes, which accounted for 97.3% of the total of feed produced). However, given that there is a deficit in the production of certain raw materials required for the production of feed, Spain has to turn to foreign markets in order to source the cereals and proteins needed for their production.

In the case of soy, the feed manufacturing sector is dependent on the imports of soy from third party countries, such as Brazil, USA and Argentina.

At national level, the sole representative of FEFAC in Spain is the Spanish Feed Manufacturers Confederation (CESFAC), which also represents the sector before the European Feed Manufacturers' Federation (FEFAC), the Spanish Federation of Food and Beverage Industries (FIAB) and the Spanish Interprofessional of Animal Nutrition. The companies manufacturing animal feed recognise<sup>35</sup> the responsibility that they have in the sustainable production of products that they commercialise or process. The sector is committed to exploring and intensifying the efforts towards more responsible practices with those that meet the demand for competitive, hi-

gh-quality, safe and healthy products, doing so through increasingly efficient processes that respect the environment which respond to the demands outlined in the European Green Deal.

In order to fulfil these demands, the sector is undertaking various actions that are marked in the **CESFAC Sustainability agenda 2030**, whose strategy is currently under development. As part of it, the animal feed sector participates in the **National Roundtable of sustainable feed materials, chaired by the Ministry of Agriculture, Fisheries and Food** and with the participation of other interested parties that participate in the value chain for soy and other raw materials, with the aim of promoting the development of sustainable supply chains and committed to the fight against deforestation. It is a forum that began its work in 2019 and that is going to have a very relevant role in the co-ordination and representation of the sector in the face of different initiatives that are being undertaken in the EU and the growing demand by society.

One of the main questions that the sector intends to address is that of "imported deforestation", linked to the raw materials that are required in its production chain but by being produced in countries outside the EU, they are

<sup>35</sup> Source: https://cesfac.es/images/MundoCesfac/pdf/49 mundo Cesfac.pdf

ruled by a less demanding regulation in relation to the environment. Due to this, the need to undertake studies (such as this one) regarding the origin of soy used by the animal feed manufacturing industry in Spain, is the first step to identifying the relevance of the existing risks and

suggesting actions that minimise them.



«Imported deforestation» is one of the main issues that the sector must address.









The growing demand for food requires sustainable production.



#### What is sustainable soy?

Animal feed forms a key component in the path towards more sustainable livestock production. In a world with a growing demand for food and resources that are increasingly more restricted, production should be sustainable; this implies that the feed industry should be competitive to satisfy the demand for products, efficient in the use of resources and responsible in the supply chain of safe feed.

With the aim of providing transparency to the responsible soy supply chain and creating awareness of the importance of co-operation of all the agents in order to enable the transformation of the market, the European representative of the animal feed manufacturing industry, FEFAC, prepared the FEFAC Soy Sourcing Guidelines in 2015, as previously indicated, that to date is the reference in the sector and outlines the roadmap to responsible soy sourcing in the EU.

The FEFAC code incorporates a recommendation that seeks to accelerate the advances in order to achieve a more responsible and sustainable soy supply chain. To do this, it combines a series of minimum

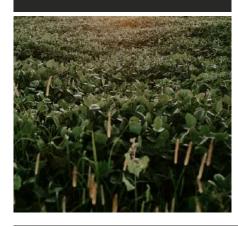
requirements related to good environmental, social and agricultural practices in soy production, covering six principles (fulfilment of the law, responsible work conditions, environmental responsibility, good agricultural practices, respect for the legal use of land/rights of the land and the protection of community relationships). Each principle is sub-divided into a series of specific criteria, with a distinction between essential criteria and desired criteria. All the essential criteria and at least five desired criteria should be included in the programmes of soy sustainability in order to fulfil the requirements of the FEFAC soy sourcing guidelines.

Currently, FEFAC is working on updating these guidelines, with the aim of adapting to the demands of the market and the company in terms of responsibility and deforestation. It does not refer to a closed document, but one that evolves to increase the level of ambition and new criteria shall be included or the nature of the existing one shall change from desired to essential. Therefore, it intends to increase the volume of responsible soy (and free from deforestation) included in the supply chain.

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#### Sustainable soy for feed manufacturing

FEFAC is working to increase the volume of responsible soy.



Therefore, the supply in accordance with the FEFAC sustainability guidelines is considered to be the reference for responsible soy supply within the feed manufacturing sector in Spain by CESFAC.

An additional element to be considered in terms of deforestation and responsible soy is the origin of the productions, given that the risk of deforestation differs according to the geographic origin of the production.

Although there is soy production in Europe, as we indicated previously with the data relating to trade and import, the majority of soybean meals and soybeans imported into the EU and Spain come from the American continent, particularly Brazil, Argentina and the USA.

It is important to highlight that soy production in the USA is based on a national system of laws and regulations for sustainability and preservation, which are combined with the careful implementation of the best production practices by the country's producers. Additionally, these participate in numerous volunteer programmes for sustainability and preservation that are certified and audited and 95%<sup>36</sup>

of American soy producers participate in preservation programmes and they apply sustainable production practices. In addition, the majority is imported according to the US Soy Sustainability Assurance Protocol (SSAP). As a result of this, the confidence in its low deforestation risk is supported.

In accordance with FEFAC's indications, the soy production from the USA, Canada, the European Union and Ukraine is considered to have a low deforestation risk. Regarding production in Brazil and Argentina, the origin of a large part of soy imported to Spain, any Argentina soy that comes from outside the Gran Chaco area or the soy from Brazil produced in accordance with the Amazon Soy Moratorium is deemed to be low risk. The Amazon Soy Moratorium is the previously-mentioned voluntary agreement signed in 2006 by representatives of civil society, agro-industrial sectors and the Brazilian government, which establishes the commitment to not trade or finance the soy produced in deforested areas of the Amazon biome after the 22<sup>nd</sup> of July 2008, reference date of the Forest Code).

<sup>&</sup>lt;sup>36</sup> Source: https://thesustainabilityalliance.us/es/soja-de-estados-unidos/

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#### Sustainable soy for feed manufacturing

# Sustainable soy programmes

The main companies that produce and trade soy and operate in Brazil and Argentina are not unaware of the commitments to stopping deforestation or adopting more sustainable production models from a triple perspective: social, environmental and economic. Because of this, as of many years ago, these commitments have been focused on different activities that range from the preparation of information reports to the creation of programmes that encourage good environmental practices focused on production or the improvement of traceability with the inspection and monitoring of production properties to assess the agricultural practices and their link to deforestation.

By means of the *TRASE* information platform, **the main** soy companies operating in Brazil and Argentina which supply soy to Spain have been identified. Below, examples of the sustainability commitments and policies of these companies are shown:

#### **AMAGGI**

It regularly prepares sustainability reports and publishes them on its corporate webpage, which has a highlighted section related to all its sustainability commitments: <a href="https://www.amaggi.com.br/wp-content/uploads/2019/08/Sustainability-Report-2018-AMAGGI.pdf">https://www.amaggi.com.br/wp-content/uploads/2019/08/Sustainability-Report-2018-AMAGGI.pdf</a>.

Additionally, it has different certifications (<a href="https://www.amaggi.com.br/relatorio2018/certifications/">https://www.amaggi.com.br/relatorio2018/certifications/</a>); among these, the ARS (Amaggi Responsible Standard) stands out. This is its own sustainability scheme for the social-environmental handling of the production areas that has been applied since 2016.

Part of its production is also certified by the *PROTERRA* and RTRS (Round Table on Responsible Soy) programmes, highlighted as being one of the producers with a heightened certified production.

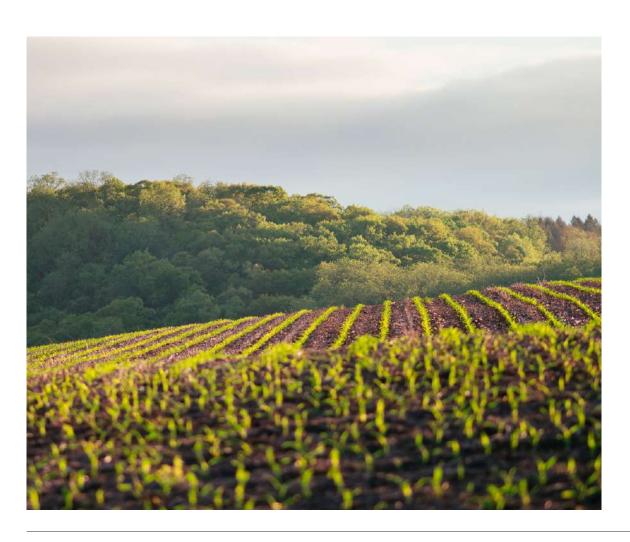
#### LOUIS DREYFUS COMPANY (LDC)

It has a specific policy regarding sustainability that may be consulted in the following link: *Soy Sustainability Policy:* <a href="https://www.ldc.com/py/wp-content/uploads/sites/14/SSP">https://www.ldc.com/py/wp-content/uploads/sites/14/SSP</a> EN FINAL.pdf.

It has reports on its commitments and performance in terms of sustainability in which its operations in Argentina are outlined: <a href="https://www.ldc.com/ar/en/sustainability/sustainability-action-in-argentina/">https://www.ldc.com/ar/en/sustainability/sustainability-action-in-argentina/</a>.

In Brazil, it is part of the *Soft Commodities Forum working* group for the Cerrado. The 2019 report on transparency in its value chain may be consulted here: <a href="https://www.ldc.com/wp-content/uploads/">https://www.ldc.com/wp-content/uploads/</a> SCF June2019Report LDC.pdf.

Additionally, it prepares a report only for its operations in Brazil, which may be examined for 2019 at this link: <a href="https://www.ldc.com/wp-content/uploads/LDC">https://www.ldc.com/wp-content/uploads/LDC</a> 2019-Sustainability-Report secured.pdf.



On the other hand, it has its own certification scheme, the *Sustainable Agriculture Certification Program*, which has been approved by FEFAC: <a href="https://www.ldc.com/wp-content/uploads/SCF\_June2019Report\_LDC.pdf">https://www.ldc.com/wp-content/uploads/SCF\_June2019Report\_LDC.pdf</a>.

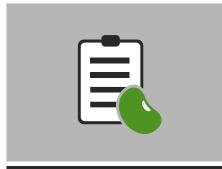
Every six months, it prepares data reports regarding the sustainable soy production models.

The following links contain the reports for January 2020: <a href="https://www.ldc.com/py/wp-content/uploads/sites/14/Sustainable-Soy\_30.1.2020.pdf">https://www.ldc.com/py/wp-content/uploads/sites/14/Sustainable-Soy\_30.1.2020.pdf</a> and June 2020: <a href="https://www.ldc.com/wp-content/uploads/Brazil-and-Argentina-Deforestation-Risk-Profile\_24.6.2020\_final.pdf">https://www.ldc.com/wp-content/uploads/Brazil-and-Argentina-Deforestation-Risk-Profile\_24.6.2020\_final.pdf</a>.

#### **COFCO**

It prepares an Annual Sustainability Report. Its latest edition may be consulted in this link: <a href="https://www.cofcointernational.com/media/1695/cofco">https://www.cofcointernational.com/media/1695/cofco</a> or final proof 1july.pdf.

Additionally, it has aligned its mission in terms of sustainability with the aims of the United Nations' Sustainable Development Goals (SDGs). <a href="https://www.cofcointernational.com/media/1376/0755-cofco-sr-summary-ml-040719-online\_spanish\_spreads.pdf">https://www.cofcointernational.com/media/1376/0755-cofco-sr-summary-ml-040719-online\_spanish\_spreads.pdf</a>.







#### **GLENCORE**

It prepares annual sustainability reports that include information related to the sustainability criteria it applies to its soy production activity. <a href="https://files.glencoreagricultu-re.com.au/Sustainability Report 2019/">https://files.glencoreagricultu-re.com.au/Sustainability Report 2019/</a>.

As well as this, part of its production in Brazil is certified under the *BTRS* standard.

In the following link, the data related to 2019 may be consulted, the last year with full details. <a href="https://responsiblesoy.org/wp-content/uploads/2020/03/Glencore">https://responsiblesoy.org/wp-content/uploads/2020/03/Glencore</a> AR-RTRS-2019.-Industry-Trade-Finance.pdf.

However, this company has recently been renamed *VITERRA*, due to which many of the existing references to it have been modified.

#### **CARGILL**

It prepares a semester Sustainable Soy Report with the progress taken to stop deforestation and improve the performance in terms of sustainability.

Reports may be consulted in this link: <a href="https://www.cargi-ll.com/sustainability/sustainable-soy">https://www.cargi-ll.com/sustainability/sustainable-soy</a>

Additionally, it has the Triple S Programme, <a href="https://www.soja3s.com/es/que-es/">https://www.soja3s.com/es/que-es/</a> that assembles a sustainability certification for the soy produced under the supervision of CARGILL. This programme meets the FEFAC Soy Sourcing Guidelines.

#### BUNGE

In addition to regular reports on its sustainability commitments, it has its own certification, PRO S <a href="https://www.bunge.com/sustainability/non-deforestation">https://www.bunge.com/sustainability/non-deforestation</a>, regarding this, its no deforestation commitments are assembled. It refers to a programme that meets the criteria for FEFAC's Soy Sourcing Guidelines.

Additionally, they use other certifications such as ISCC (International Sustainability and Carbon Certification) and RTRS (Round Table on Responsible Soy).

Regarding two of the main businesses for the exportation of soy from Argentina to Spain, **VICENTIN** and **ACEITERA GENERAL DEHEZA**, no pu-

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#### Sustainable soy for feed manufacturing

blic information has been found in relation to their commitments to sustainability.

About this

#### **RTRS**

Additionally, one of the standards most often referred to by these companies as a programme that supports the commitment to stopping deforestation is RTRS (Round Table on Responsible Soy), which, in addition to being an initiative to encourage the sustainability commitments of the soy production sector, uses this certification to create a certified soy market <a href="https://responsiblesoy.org/compradores-de-soja-fisica">https://responsiblesoy.org/compradores-de-soja-fisica</a>.

These are the different scopes of certification, as they differ in terms of what is applied to soybeans and soy seeds or soy oil and the reason there may be for each one: <a href="https://responsiblesoy.org/certificacion#alcances">https://responsiblesoy.org/certificacion#alcances</a>.

In terms of information regarding the certified volumes in RTRS, in 2018 both AMAGGI and ACEITERA GENE-RAL DEHEZA certified part of their production under this standard in accordance with the public data offered on the webpage of this initiative.

# Use of sustainable soy programmes

Currently, there is a great diversity of programmes or standards aimed at approving sustainability in the soy production models. The previous section detailed some examples of programmes adopted by companies that commercialise and supply soy to Spain from Brazil and Argentina.

With the aim of increasing the transparency in the international value chains, the International Trade Centre (ITC) created *Sustainabilitymap*<sup>37</sup> in 2017, an online platform that enables information related to initiatives and programmes of sustainability of interest for international trade. This tool hopes to help members of the value chain to better understand the sustainability regulations that affect the export markets.

This platform presents a tool that allows for a comparison of the sustainable soy programmes of the businesses with FEFAC's Soy sourcing guidelines in order to determine its compliance with the European feed industry's

Sustainabilitymap platform provides information on initiatives and programs sustainability of interest in international trade to help value chain members better understand sustainability standards.



<sup>&</sup>lt;sup>37</sup> Sustainability Map ITC <a href="https://sustainabilitymap.org/home">https://sustainabilitymap.org/home</a>

The tool allows owners of responsible soy programs to self-assess their compliance with the FEFAC Soy sourcing guidelines.



requirements. The tool allows the owners of the responsible soy programmes to self-assess their compliance. Notwithstanding, only a number of programmes have passed the comparative assessment of the ITC and fulfil the criteria established by FEFAC. This platform, *Sustainabilitymap*, has completed a job of bringing together these programmes of sustainability and stopping the deforestation sponsored by FEFAC so as to certify the good sustainability practices in soy production and, currently, a total of 19 different programmes corresponding to standards applied in soy production at different regions on a global level have been identified.

The subject of this study is focused on the soy imported by Spain whose production originates in Brazil or Argentina. Because of this, some of the standards that are considered in the platform are of no interest, due to being applied to soy production in Europe, as is the case of *Donau Soja, Europe Soy*, or in the USA, as SSAP. As a result, we have used this platform for the study of programmes started by the main producers and traders that supply soy to Spain, or even the independent programmes under which they accredit their commitments to the fight against deforestation.

- ADM Responsible Soybean Standard.
- Amaggi Responsible Standard.
- Bunge PRO S.
- Cargill Triple S.
- ISCC Plus.
- Proterra.
- RTRS (Round Table for Sustainable Soy).

The platform considers criteria that are gathered in the categories of: Environment, Social, Handling and Ethics. Within the environment category, there are 8 sub-categories: Soil, Forests, Input, Biodiversity, Waste, Water, Energy and Climate Change; even though the Forests and Biodiversity categories are those deemed relevant to the subject of this study because they include criteria related to the preservation of natural eco-systems and the handling and conversion of forest zones. Both categories gather 7 and 21 criteria respectively, with these being the ones that have been taken as a reference to assess their commitment with stopping deforestation and the preservation of the forest biomes.

LDC's Sustainable Agriculture Certification Program, despite having received the approval of FEFAC

regarding the compliance of its programme with FEFAC's sourcing guidelines, had not included their criteria in the Sustainabilitymap platform at the moment of the study and, as such, it is not possible to make the comparison.

It should be pointed out that all the programmes mentioned have completed the comparative assessment of the ITC and meet the requirements established by FEFAC but we may highlight that they include additional criteria that indicates a greater commitment to sustainability and the fight against deforestation.

Regarding the criteria related to the Forests category, certain standards, such as ADM or ISCC Plus, rely on additional criteria, for example regarding the actions for the regeneration of the forest mass or encouraging the conversion of agricultural land to forest land.

Additionally, some programmes establish more demanding criteria related to deforestation, such as the prohibition of production in areas with legal deforestation after a certain date specified in its programme or the establishment of audits completed by organisms of independent certification.

In terms of criteria in the Biodiversity category, almost all the standards rely on additional criteria, with ADM, ISCC Plus and RTRS in particular standing out in terms of the recommendations of the FEFAC Code. For example, these criteria refer to the creation of areas of damping or biological corridors or the primary care for habitats and species that are under threat.

As such, it may be concluded that the main standards referred to by the soy producers and exporters to Spain, apart from indicating that they meet FEFAC's recommendations and requirements, present additional criteria that is more demanding.



The main standards referenced by soy producing and exporting companies comply with the FEFAC recommendations and present additional criteria.







#### Analysis of "sustainable soy" flows in the imports to Spain from Brazil and Argentina

With the aim of undertaking an analysis of "sustainable soy" flows in imports to Spain from Brazil and Argentina, the information relating to the soy imported to Spain has been organised and classified. The information used is on the *TRASE*<sup>38</sup> platform and refers to the businesses that supply soy, considering the most important business groups that represent more than 80% of the production imported to Spain from the main exporting countries: Brazil and Argentina.

Broadly speaking, we may differentiate 3 main categories:

Sustainable with low or no deforestation risk
that includes certified production, that is to say,
production according to the standards of the company or some supplier, according to a sustainability programme that considers criteria relating to the
fight against deforestation or preceding from biomes with low or no deforestation risk.

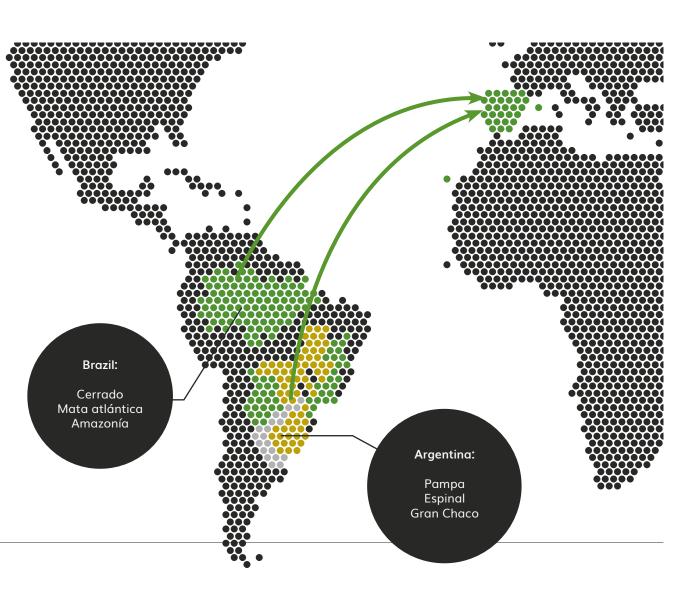
- With moderate or high risk, due to not having certifications and/or originating from biomes in which illegal activities related to deforestation continue.
- Without information, regarding which it is not possible to make a specific judgement due to the lack of necessary information, though it does not originate from identified at-risk areas.

In accordance with FEFAC, soy is considered to come from areas of low deforestation risk if it is Argentinian soy from outside the Gran Chaco area or soy from Brazil in accordance with the *Amazon Soy Moratorium*, the voluntary agreement signed in 2006 by the representatives of civil society, agro-industrial sectors and the Brazilian government, which establishes the commitment to not trade or finance soy produced in deforested areas of the Amazon biome after the 22<sup>nd</sup> of July 2008, reference date in the Forest Code).

<sup>38</sup> TRASE database for soy imported from Brazil SEI-PCS Brazil soy v2.5.0 <a href="http://resources.trase.earth/documents/data\_methods/Brazil-soy-v2.5.0%20June%202020.pdf">http://resources.trase.earth/documents/data\_methods/Brazil-soy-v2.5.0%20June%202020.pdf</a> and from Argentina SEI-PCS Argentina soy v1.0.1 <a href="http://resources.trase.earth/documents/data\_methods/Argentina-soy-v1.0.1%20June%202020.pdf">http://resources.trase.earth/documents/data\_methods/Brazil-soy-v2.5.0%20June%202020.pdf</a> and from Argentina SEI-PCS Argentina soy v1.0.1 <a href="http://resources.trase.earth/documents/data\_methods/Brazil-soy-v2.5.0%20June%202020.pdf">http://resources.trase.earth/documents/data\_methods/Brazil-soy-v2.5.0%20June%202020.pdf</a> and the TARIC codes indicated in the first part of this study have been included and in order to harmonise the amounts of the different soy products, an equivalence factor is applied with the used product as a reference, which is the soybean. In order to do this, the amounts of soy flour (TARIC code 120810), soy oil (TARIC codes 150710 and 150790) and soy cake (TARIC code 230400) were multiplied by 1.031, which is the equivalence factor TRASE uses to calculate the amount of soybean required for its production.

#### As such, it considers:

- Production in the Amazon biomes under the Amazon Soy Moratorium, as an additional guarantee of good practices in the management of soils that complements the value provi- ded by the commitment of corporate certificates. Accordingly, it should be highlighted that the businesses that account for more than 80% of production in Brazil form part of the Amazon Soy Moratorium.
- Production in the Argentinian Gran Chaco with certifications such as volume associated with "sustainable".
- The volume produced in the category "Without information" but proceeding from at-risk biomes such as Gran Chaco (Wet and Dry Chaco) in Argentina or the Cerrado in Brazil has been considered a volume of risk, adopting thusly, a preservation strategy.



#### Soy from Brazil

The greater amount of soy imported by Spain comes from Brazil, surpassing 2 million tonnes in recent years, about 40% of the total. As such, the adoption in this country of measures to stop deforestation is going to have an important relevance in these "sustainable soy" flows.

As indicated, data from the TRASE source of public data regarding soy exported to Spain in tonnes for the years 2016-2018 by the six main businesses that do so from Brazil and that reach 85% of the total soy exports has been processed. Soy has been classified into four different categories:

1. Soy produced in agreement with a sustainability programme that considers criteria or policies focused on the fight against deforestation belonging to each one of the businesses. Additionally, it details the soy coming from the Amazon region and produced under the fulfilment of the Amazon Soy Moratorium as an additional guarantee of the



- commitment against deforestation and soy produced according to a programme of sustainability that does not belong to the importing business, such as, for example, RTRS.
- 2. Soy without information related to the accreditation of any certification or programme and that is not produced in the Cerrado.
- 3. Soy without information related to the accreditation of any certification or programme and that is produced in the Cerrado so it may be linked to the risk of deforestation.
- 4. Soy not in agreement with sustainability programmes or certifications.

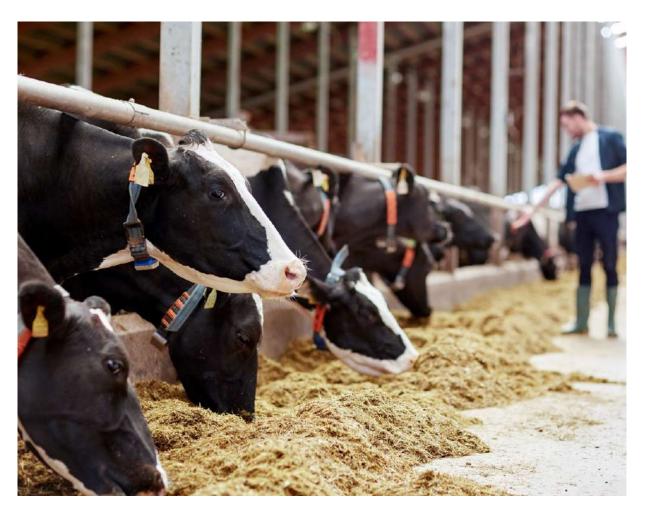
### Sustainable soy for feed manufacturing

### Amount of soy imported from Brazil for years

		2016		2017		2018	
	Total available to sustainable	1,607,245	88.94%	1,588,925	79.53%	1,726,933	84.06%
Soy produced in agreement with a sustainability programme that considers criteria or policies	In compliance with the Amazon Soy Moratorium.	708,894	39.23%	773,291	38.71%	606,129	29.51%
focused on the fight against deforestation.	In agreement with a sustainability programme that does not belong to the import business, such as RTRS, for example.	1,844	0.10%	0	0.00%	155,308	7.56%
Soy without information related to the accreditation of any certification or programme and that is not produced in the Cerrado.		44,722	2.48%	264,031	13.22%	294,384	14.34%
Soy without information related to the accreditation of any certification or programme and that is produced in the Cerrado so it may be linked to the risk of deforestation.		28,163	1.56%	135,585	6.79%	23,704	1.15%
Soy not in agreement with sustainability programmes or certifications.		126,860	7.02%	9,255	0.46%	9,298	0.45%
Total imported to Spain (tonnes)		1,806,990	100%	1,997,796	100%	2,054,319	100%

Table 1 – Amount of soy imported from Brazil in 2016, 2017 and 2018. Reference TRASE.

### Sustainable soy for feed manufacturing



Between 2016 and 2018, in accordance with the display of the data studied: the soy exported to Spain by the six main businesses that operate from Brazil (that amount to 85% of the total), the percentage of soy that has some certification has varied between 79.5% and 88.9%, being 84% in 2018. At the same time, the amount considered as deforestation-risk soy has substantially decreased, having fallen from 8.6% in 2016 to 1.6% in 2018. This may be observed in the previous tables (see table 1).

As a consideration, the amount of soy imported of which there is no information regarding any certification or programme, but that is not produced in the Cerrado, increases from just 2.5% in 2016 to 14.3% in 2018.

A complementary analysis has been undertaken to determine the soy flows in terms of their deforestation risk and biome of origin.

In the case of Brazil, in 2018, Spain imported 2 million and 400 thousand tonnes of soy and the six companies included in the study represented 85% of this amount. (See figure 1).

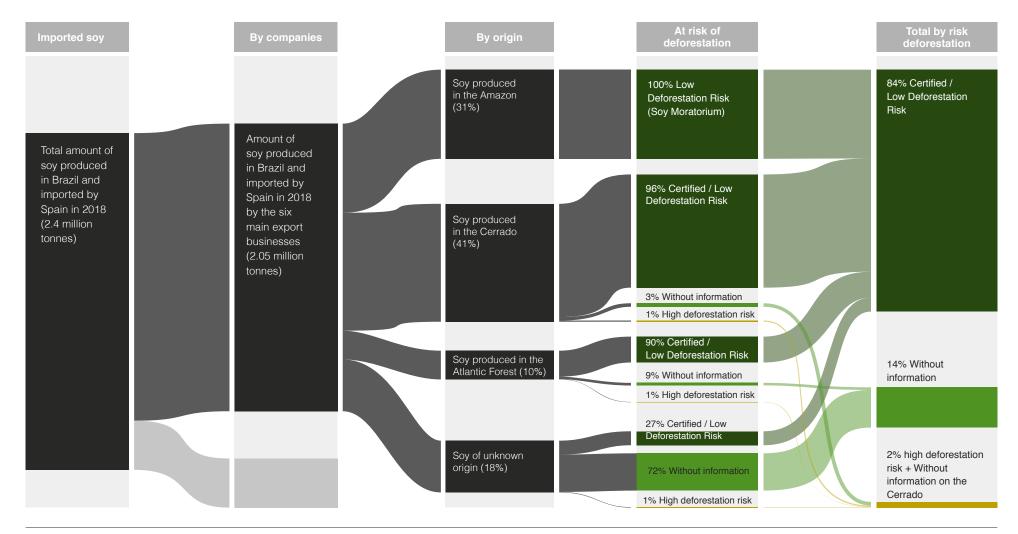


Figure 1. Outline for soy imported from Brazil for the year 2018. Reference: TRASE

### Sustainable soy for feed manufacturing

100% of soy produced in the Amazon complies with the Amazon Soy Moratorium.



The origins of the soy imports in Spain are mainly, the Cerrado (41%) and the Amazon (31%), followed by the Atlantic Forest (10%) and there is no information regarding the production area of 18% of imported soy.

The majority of soy produced in Brazil and imported to Spain in 2018 relies on some certification or is part of some programme that sponsors its commitment to the supply of responsible soy and contributes to stopping deforestation. Mainly, it deals with the programmes exposed beforehand in the Assessment of sustainable soy programmes section.

100% of soy produced in the Amazon complies with the Amazon Soy Moratorium, since the import businesses included in this study (six main businesses that amount to 85% of total soy exports to Spain) are signees of this agreement; as a result of which, this soy production has been considered to have a low risk of deforestation.

Regarding soy proceeding from the Cerrado and imported, both directly by any of the previously-mentioned businesses, and acquired by these through other suppliers, 96% rely on some of the certifications that fulfil the FEFAC sourcing guidelines and just 1% do not have any certification.

Regarding that produced in the Atlantic Forest, 90% have some of these certifications and less than 1% are not certified.

Including those amounts of soy whose production area is not identified, 27% have sustainability programmes according to *TRASE's* data, while only 0.5% are shown to not be certified.

Additionally, 2% of the soy imported to Spain by these six companies from Brazil may be considered at risk of deforestation, due to being soy without information relating to any certification or programme produced in the Cerrado and soy produced in other biomes but that do not comply in agreement with programmes or certifications of sustainability.

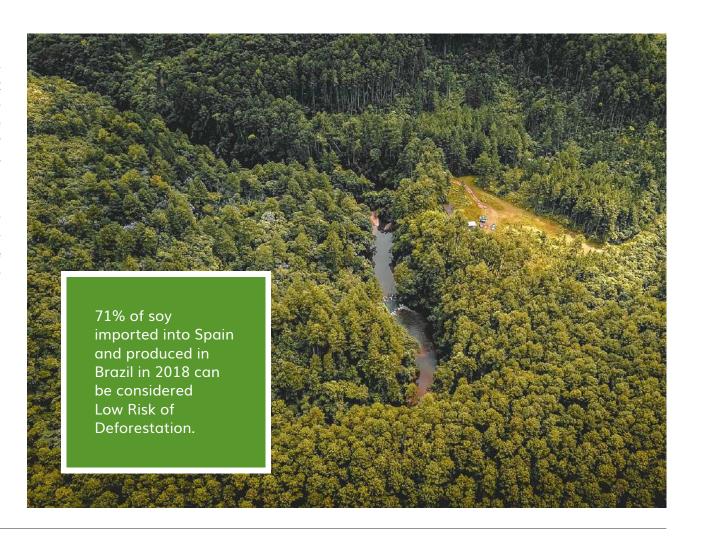
There is no specific information regarding the origin or existence of certifications that support their production under programmes that contribute to stopping deforestation in 14% of soy produced in Brazil.

As a whole, 71% of the total of soy imported by Spain and produced in Brazil in 2018 may be considered to be Low Deforestation Risk, (84% of the soy imported to

### Sustainable soy for feed manufacturing

Spain by the six main export businesses in Brazil, which is also 85% of the total imported). It is considered to be Low Deforestation Risk mainly due to it being produced in the Amazon, where full compliance with the moratorium has been reached among the main producers; otherwise, it is produced in other biomes, but always according to sustainability programmes that rely on measures to stop deforestation.

With the aim of having a vision of a trend that the import of soy has had and which changes have happened in recent years in terms of its origin or the adoption of sustainability programmes that contribute to stopping deforestation, these **flows for 2016 and 2017** have also been analysed (see tables 2 and 3).



		Soy produced in the Amazon (40%)	97% Low Deforestation Risk (Soy Moratorium)  — High deforestation risk  3% Without information
Total amount of soy produced in Brazil and imported by Spain in 2017 (2.34 million tonnes)	Amount of soy produced in Brazil and imported by Spain in 2017 by the six main export businesses (2 million tonnes)	Soy produced in the Cerrado (42%)	82% Certified / Low Deforestation Risk  1% High deforestation risk  17% Without information
		Soy produced in the Atlantic Forest (9%)	60% Certified / Low Deforestation Risk  — High deforestation risk  40% Without information
		Soy of unknown origin (9%)	Certified / Low     Deforestation Risk      High deforestation risk  100% Without information

	Certified / Low Deforestation Risk	High deforestation risk + Without information on the Cerrado	Without information
Total	79%	7%	14%

		Soy produced in the Amazon (41.5%)	97% Low Deforestation Risk (Soy Moratorium)  1.5% High deforestation risk  1.5% Without information
	Amount of	Soy produced in the Cerrado	85% Certified / Low Deforestation Risk
Total amount of	soy produced in Brazil and imported by Spain in 2016 by the six main export businesses (1.8 million tonnes)	(42.5%)	11% High deforestation risk
soy produced in Brazil and			4% Without information
imported by Spain in 2016 (2.05 million		Soy produced in the Atlantic Forest (12.5%)	72% Certified / Low Deforestation Risk
tonnes)			22% High deforestation risk
			6% Without information
			50% Certified / Low Deforestation Risk
		Soy of unknown origin (3.5%)	— High deforestation risk
			50% Without information

	Certified / Low Deforestation Risk	High deforestation risk + Without information on the Cerrado	Without information
Total	88%	8.5%	3.5%





The first element highlighted is the increase in the amount of soy imported by Spain from Brazil, according to the increase of feed production and the inclusion of soy in it.

Additionally, the percentage of the total formed by the six main importers is more than 85%, a sign of their relevance in the supply of soy to Spain. It is also highlighted that the percentage of soy produced in the Amazon has decreased, at the same time the soy imported produced in this biome under the compliance of the *Amazon Soy Moratorium* has reached 100%.

The percentage of soy produced in the Cerrado has been consistent at 42%, even though the fact that the amount imported has increased means that

production originated in this biome has also increased. However, the percentage of soy produced in this biome that relies on programmes with commitments in the fight against deforestation continues to increase, from 82% in 2017 to 96% in 2018.

Finally, this analysis also states that the percentage of soy imported grows in a relevant way and there is no confirmed information regarding the

### Sustainable soy for feed manufacturing

production area or the accreditation of the compliance of commitments in the fight against deforestation. In 2016, this was 3.5% and in 2017 and 2018, it has increased to 14%.

As a whole, regarding the total of soy imported by Spain and produced in Brazil in 2016, the percentage of soy imported considered Low Deforestation Risk represented 60.6% (88% of the soy imported to Spain by the six main exporting businesses of Brazil, that amounts to 87.8% of the total imported), while in 2017 the same percentage reached 67.5% (79% to 85.4% of the soy imported from Argentina).

### Soy from Argentina

In the case of Argentina, it is the second most important country in terms of soy imported by Spain, with amounts that are slightly less than those from Brazil, though it has about 20% of the total imported every year.

In this case, the adoption of measures to stop deforestation has come about more recently and as a result of an expansion in growing in the area of the Gran Chaco, a biome shared with Paraguay and Bolivia.

As has been indicated, the information from *TRASE* has been used as the source for this data. The data shows that the soy exported to Spain by the eight main businesses from Argentina amounts to 94.8% of the total. Among these, the same six companies that export from Brazil have also been included, whose data has been analysed above.

Similarly to the soy from Brazil, soy imported from Argentina has been classified into four different categories:

1. Soy produced in agreement with a sustainability programme that considers criteria or policies focused on the fight against deforestation belonging to each one of the businesses or an independent body. Additionally, it details the soy produced in the Gran Chaco under a sustainability programme.

- 2. Soy without information related to the accreditation of any certification or programme and that is not produced in the Gran Chaco.
- Soy not in agreement with sustainability programmes but that is produced outside the Gran Chaco biome, so it is linked to low or no deforestation risk.
- 4. Soy not in agreement with sustainability programmes or certifications and that is produced in the Gran Chaco biome, so it is linked to high deforestation risk.

According to the data collected in table 4, it may be indicated that soy which relies on some certification has increased in an important way to 74.2% in 2018 from 51.3% in 2016.

This growth has been based on the notable decrease in the percentage of Soy not in agreement with sustainability programmes but that is produced outside the Gran Chaco biome, which went from 44.2% in 2016 to 21.7% in 2018.

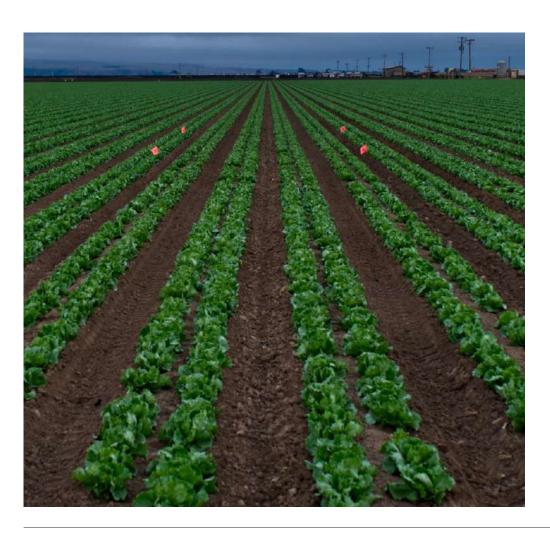
### Sustainable soy for feed manufacturing

### **Amount of soy imported from Argentina for years**

		2016		2017		2018	
Soy produced in agreement with a	Total available to sustainable	720,162	51.32%	855,850	63.30%	809,994	74.20%
sustainability programme that considers criteria or policies focused on the fight against deforestation.	Produced in the Gran Chaco under a sustainability programme	56,549	4.03%	85,042	4.26%	95,314	8.73%
Soy without information related to the accreditation of any certification or programme and that is not produced in the Gran Chaco.		15,465	1.10%	0	0.00%	12,619	1.16%
Soy not in agreement with sustainability programmes but that is produced outside the Gran Chaco biome, so it is linked to low or no deforestation risk.		620,685	44.23%	452,170	34.50%	236,745	21.69%
Soy not in agreement with sustainability programmes or certifications and that is produced in the Gran Chaco biome, so it is linked to high deforestation risk.		47,037	3.35%	43,942	2.20%	32,246	2.95%
Total imported to Spain (tonnes)		1,403,349	100%	1,351,962	100%	1,091,604	100%

Table 4 – Amount of soy imported from Argentina in 2016, 2017 and 2018. Reference *TRASE*.

### Sustainable soy for feed manufacturing



Given that both soy which has a certification programme and soy produced outside the Gran Chaco biome are considered to be linked to low or no deforestation risk, as a whole, the percentage of Soy with Low Deforestation Risk has grown minimally, from 95.5% in 2016 to 96% in 2018.

Regarding soy that is considered at risk of deforestation, which is that produced in the Gran Chaco and does not rely on any certification, it decreases from 3.35% to 2.95%.

In comparison with Brazil, it is worth highlighting that the soy imported without information on the production area or compliance with commitments for the fight against deforestation, barely reaches 1%.

Similarly, the soy flows in terms of its deforestation risk and its biome of origin have also been analysed. (See figure 2 and tables 5 y 6).

In the case of Argentina, Spain imported more than 1,150,000 tonnes during 2018 and the eight companies included in the sample studied represented 94.8% of this amount (see figure 2).

The production areas are mainly La Pampa (50%) and El Espinal (24%). Production originating from the Gran Chaco reaches 11%, while there is no information regarding the production area for just 1%.

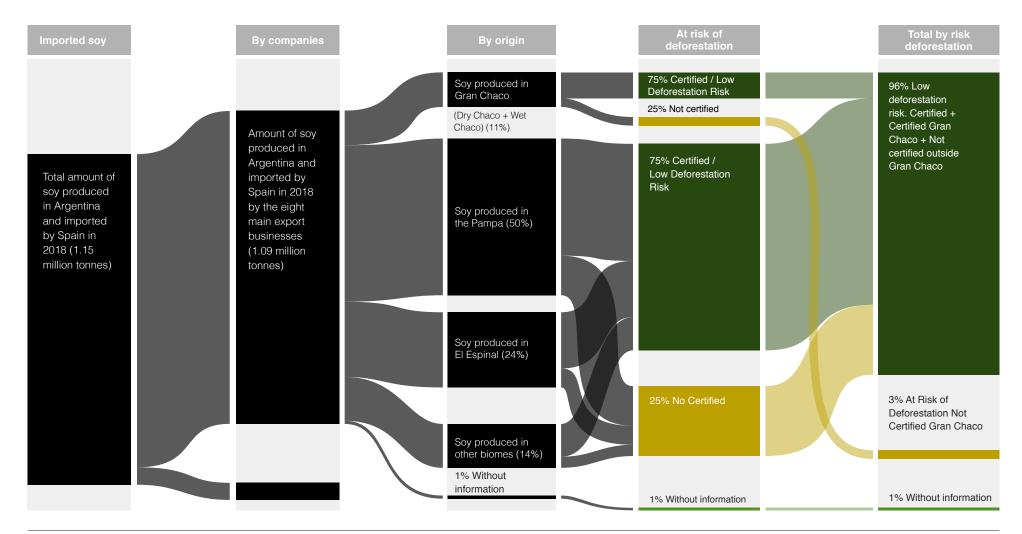


Figure 2. Outline for soy imported from Argentina for the year 2018. Reference: TRASE

96% of soy imported by Spain and produced in Argentina in 2018 may be considered Low Deforestation Risk mainly due to it being produced outside the Gran Chaco or it having a certification.

As may be seen in figure 2, just 3% may be considered At Risk of Deforestation, due to it being produced in some of the areas that form part of the Gran Chaco and not having any certification to support their No Deforestation commitments.

As a whole, 91% of the total of soy imported by Spain and produced in Argentina in 2018 may be considered to be Low Deforestaton Risk, (96% of soy imported to Spain by the six main export businesses of Brazil, which implied 94.8% of the total imported). It is considered Low Deforestation Risk mainly due to it being produced in accordance with programmes that rely on measures to stop deforestation or in spite of not complying with these programmes, having been produced outside the Gran Chaco.

Regarding soy production in the Argentinian Gran Chaco, the work being undertaken by the Argentinian

Plataforma Visión Sectorial del Gran Chaco (ViSeC) has already been mentioned, which involves 5 soy export businesses from Argentina who participated in this study. In accordance with the data provided in this last report, on the basis of a survey issued to the businesses that make the platform, 7% of soy produced in Argentina comes from the Gran Chaco biome.

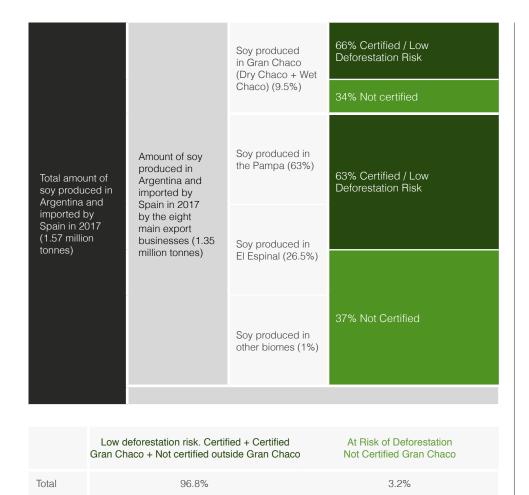
In this report, the platform has made public the main results of the diagnosis regarding the current situation of the participating businesses that account for 74% of the total of soy proceeding from Argentina, among which, these ones are highlighted:

- All the businesses possess or are committed to implementing policies in terms of sustainability with specific goals regarding No Deforestation or Conversion.
- All the businesses agree on the importance of relying on commitments and initiatives of a sectorial nature.
- More than half the businesses complete reports and other sustainability reports that

include information regarding their activities to control deforestation and/or conversion of native ecosystems. Some examples of these actions are the internal monitoring systems or external certifications.

The businesses that represent 77% of exports affirm that they have implemented traceability and monitoring processes that provide information on the production areas. This allows for identifying whether they are located in some of the protected areas in the Gran Chaco by federal legislation.

Below, we analyse the soy production flows for Argentina in 2016 and 2017:



		Soy produced in Gran Chaco (Dry Chaco + Wet Chaco) (7%)	55% Certificada / Bajo Riesgo de Deforestación  45% Not certified		
Total amount of soy produced in Argentina and	Amount of soy produced in Argentina and imported by Spain in 2016 by the eight main export businesses (1.4 million tonnes)	Soy produced in the Pampa (62%)	52% Certified / Low Deforestation Risk		
imported by Spain in 2016 (1.95 million tonnes)		Soy produced in El Espinal (30%)			
		., .,	48% Not certified		
		Soy produ Without inf	ced in other biomes (1%) ormation		
Low deforestation risk. Certified + Certified Gran Chaco + Not certified outside Gran Chaco  At Risk of Deforestation Not Certified Gran Chaco  Without information					

96%

Total

### Sustainable soy for feed manufacturing

91% of all soy of Argentina imported by Spain in 2018 can be considered Low Risk Deforestation.



First of all, comparing the data gathered in figure 2 and tables 5 y 6, it can be observed that since 2016, the percentage of soy exported to Spain by the eight main businesses has increased, going from 71.8% to 94.8%.

A clear trend regarding the production areas cannot be indicated, except for the increase of production in other biomes, something that at the beginning does not lead to a great risk of deforestation. There is an increase of the amount proceeding from the Gran Chaco, the main area at risk in Argentina, but, at the same time, the percentage of soy imported whose origin is the Gran Chaco has increased and this complies with certification programmes with measures to stop deforestation. The balance of both trends leads to there being about 3% percent of soy imported from Argentina that is considered to be At Risk of Deforestation.

Finally, the amount of soy considered to be Low Deforestation Risk has remained stable at 96%.

As a whole, regarding the total of soy imported by Spain and produced in Argentina in 2016, the percentage of soy imported considered to be Low Deforestation Risk represented 68.9% (96% of soy imported to

Spain by the eight main export businesses of Argentina, that meant 71.8% of the total imported), **while in 2017 the same percentage increased to 83.1%** (96.8% of the 85.9% of soy imported from Argentina).

### Summary of imports from the two countries

The result of adding both sets of data allows for knowing how much soy imported by Spain has been produced according to the different agreements and certifications that seek to stop deforestation and achieve greater sustainability in the value chain.

The amount of soy imported by Spain from Argentina and Brazil amounts to 72% of the total imported in 2017, falling to 65% in 2018, according to the foreign trade database of the Chamber of Commerce<sup>39</sup> (these being the last two years with complete data), which represents, as we have commented previously, a relevant percentage of soy imports.

<sup>39</sup> Foreign trade database http://aduanas.camaras.org/

### Sustainable soy for feed manufacturing

The following results are highlighted, relating to the amount of soy exported to Spain by the 6 main soy export businesses from Brazil and the 8 main export businesses from Argentina:

		BRAZIL + ARGENTINA					
		20	16	20	17	20	18
	Total available to sustainable	2,327,407	72.50%	2,444,775	72.98%	2,536,927	80.64%
Soy produced in agreement with a sustainability	In compliance with the Amazon Soy Moratorium.	708,894	22.08%	773,291	23.08%	606,129	19.27%
programme that considers criteria or policies focused on the fight against deforestation.	In agreement with some sustainability programme that is not the import business', such as RTRS.	1,844	0.06%	0	0.00%	155,308	4.94%
	Produced in Gran Chaco with a sustainability programme	56,549	1.76%	85,042	2.54%	95,314	3.03%
Soy without information regarding the accreditation of any certification or programme and that is not produced in the Cerrado or the Gran Chaco.		60,187	1.87%	264,031	7.88%	307,003	9.76%
Soy not in agreement with sustainability programmes but it is produced outside the Gran Chaco biome, so it is linked to low or no deforestation risk.		620,685	19.33%	452,170	13.50%	236,745	7.53%
	Total available to deforestation risk	202,060	6.29%	188,782	5.64%	65,248	2.07%
	Soy without information regarding the accreditation of any certification or programme and that is produced in the Cerrado, so it is linked to a high deforestation risk.	28,163	0.88%	135,585	4.05%	23,704	0.75%
Total available to deforestation risk	Soy not in agreement with sustainability programmes or certifications	126,860	3.95%	9,255	0.28%	9,298	0.30%
	Soy not in agreement with sustainability programmes or certifications and that is produced in Gran Chaco, so it is linked to a high deforestation risk.	47,037	1.47%	43,942	1.31%	32,246	1.03%
Total impo	rted to Spain (tonnes)	3,210,339	100%	3,349,758	100%	3,145,923	100%



During the three-year period considered in the study (2016-2018) and reflected in table 7,the total of soy imported to Spain from Brazil and Argentina has gone from 6.3% of soy considered to be High Deforestation Risk (2016) to just 2.07% (2018).

Given that the amount of soy imported by Spain that comes from Brazil or Argentina has not varied greatly between 2016 and 2018, remaining above 3 million tonnes, the amount of soy imported with a high deforestation risk has been reduced.

Another interesting detail is the important increase of the percentage of soy that has been produced according to programmes that support the application of measures to fight against deforestation, growing from 72.5% in 2016 to 80.64% in 2018. A good sign of this change is that this increase is due to the reduction of soy produced in Argentina outside the Gran Chaco but not in agreement with sustainability programmes.

The previous data refers to soy exported by the 6 main soy export businesses from Brazil and the 8 main export businesses from Argentina, which translates **to 78% of the total of soy imported from both countries** 

that may be considered as linked to low deforestation risk in 2018. This percentage continued growing since 2016, which leads to 73.5% of the total imported to Spain from Argentina and Brazil, reaching 74.1% in 2017.

These progresses are, undoubtedly, positive, although there is still a long way to go, mainly in raising the demands of the criteria so that they go beyond the mere fulfilment, towards a true sectorial excellence in sustainability that dissipates the doubts that still exist regarding production from countries with productions linked to the risk of deforestation.

### Relevant conclusions for the animal feed industry in Spain

From the analysis of the data regarding the origin of soy imported to Spain for the 2016-2018 period according to the TRASE platform, the following conclusions are extracted:

• In 2018, 71% of soy from Brazil and 91% of soy

from Argentina, may be considered no or low deforestation risk.

- As a whole, the soy of no or low deforestation risk reaches 78% of the total soy imported from both countries to Spain in 2018.
- The implementation of ambitious initiatives and sustainability programmes by the import and export businesses to Spain, through the adoption of activities that seek to improve the standards of production towards efficiency and environmental and social responsibility with local communities, is a fact and the path to follow, as shown by the heightened percentage of soy coming from low deforestation risk areas or produced in agreement with sustainability programmes that include no deforestation policies.
- The commitment to increasing transparency in the origin of soy allows for the increase of untying production from deforestation risk areas. Among the most important commitments, the Amazon Soy Moratorium initiative in Brazil

or the Sectorial Vision of the Argentina Gran Chaco Platform (ViSeC) in Argentina stand out as guarantees of the sustainable origin of an important part of the soy imported to Spain.

### **Analysis of sustainability** commitments by the animal feed manufacturing sector

Promoting sustainable production represents the firmest commitment for the agri-food sector, considering the great challenges it is currently facing and that will be faced in the future.

Along with technology and new business models, sustainability is inspiring a global transformation that affects all the economic agents from the production sector at the outset, as previously seen, to production and commercialisation to finally reaching customers, from an increasingly more ambitious perspective where the European strategy, "Farm to fork", has a particular relevance as part of the European Green Deal.

### Sustainable soy for feed manufacturing

With the aim of continuing to understand the dynamics of market transition to more sustainable models and analysing other links in the value chain, in order to verify its alignment with the previous conclusions, a survey of the feed manufacturers that are members of CESFAC was performed.

Through a series of questions, it has attempted to discover the vision and approximation to sustainability, understand the commitments that have been acquired and what the future projections are, bearing in mind the current context.

It is important to listen to and compare different perspectives to enrich the analysis of a sector that is taking measures towards a more responsible production and that is advancing to find solutions to the challenges of the animal feed sector.

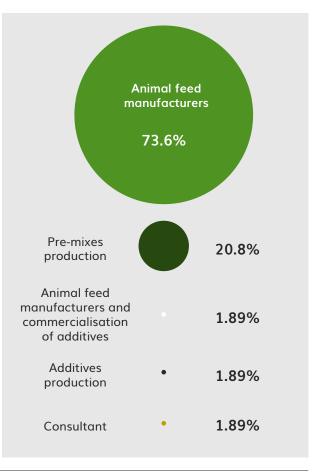
Below, the results obtained from 52 businesses in the sector, including some of the most important economic actors, are gathered. It is estimated that the participating businesses represent 60% of the national production of animal feed.

Regarding the profile of businesses participating, it is mainly animal feed manufacturers that have participated in the survey, almost 75% of the total, while 1 out of every 5, 20%, are businesses dedicated to the production of pre-mixes. In the first matter, the practices and measures that are being taken in the businesses with the aim of encouraging the integration of sustainability into production are being addressed.

On average, the animal feed producers and the premix producers (which, together, form 96.2% of those surveyed) have selected more than 4 strategies, showing that there is a variety of activities towards sustainability, highlighting a greater commitment to some of them.

The recommendations developed by FEFAC in their vision on sustainability<sup>40</sup>, highlight three areas: efficiency in the use of resources, energy and water, responsible supply chain and reduction of the environmental footprint of the sector, and at the sight of the initiatives indicated, the animal feed production sector in Spain is working on all of these.

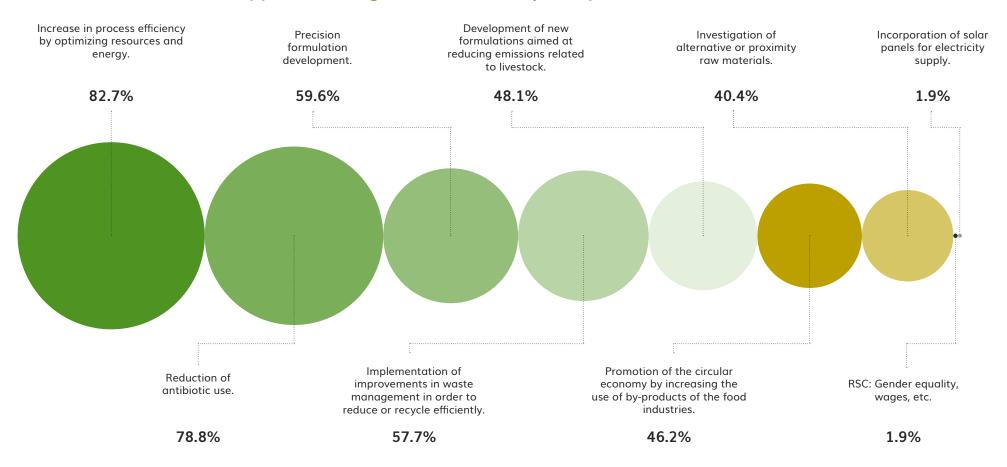
### Type of company



<sup>&</sup>lt;sup>40</sup> FEFAC Vision on sustainability. https://fefac.eu/wp-content/uploads/2020/07/16\_pr\_9\_vision\_paper\_sustainability\_final\_draft.pdf

### Sustainable soy for feed manufacturing

### Practices and measures applied to integrate sustainability into production\*



<sup>\*</sup> Sustainability is being consolidated in many areas of the agri-food value chain. What practices and measures are being taken in your business with the aim of increasing the integration of sustainability in its production?».

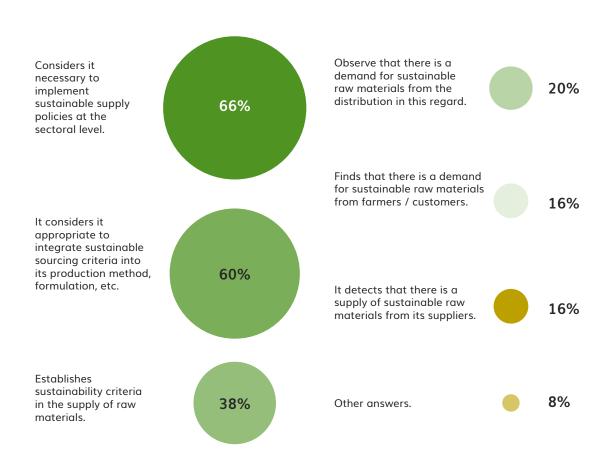
It is the case of the increase in efficiency of the processes by means of the optimisation of resources and energy and the reduction of the use of antibiotics, approximately 8 out of 10 businesses state that they are developing these strategies, regarding which it should be highlighted that both are quite relevant when it comes to addressing the rising demand for resources and energy, in addition to the problem of anti-microbial resistance, a worrying environmental and social problem.

6 out of 10 businesses state that they are implementing measures that are related to the better management of waste or the formulation of precision, with the aim of improving the efficiency of resources.

The remaining measures associated with the reduction of green-house gas emissions, the growth of the circular economy or R+D in order to identify alternative raw materials, present a minor impact and they are being adopted by less than half of the participating companies.

The role of the supply chain in the sustainability of raw materials is a key element and, accordingly, the interest of knowing the vision of the participating businesses regarding it. It may be highlighted that a majority of businesses have a favourable opinion on the adoption of criteria.

### Business vision for sustainable sourcing\*



<sup>\*</sup> Answers to the question: «Regarding sustainable sourcing, as a company ...».

In fact, 6 out of every 10 consider it convenient to integrate sustainability criteria and more than half of them state that they are currently applying them.

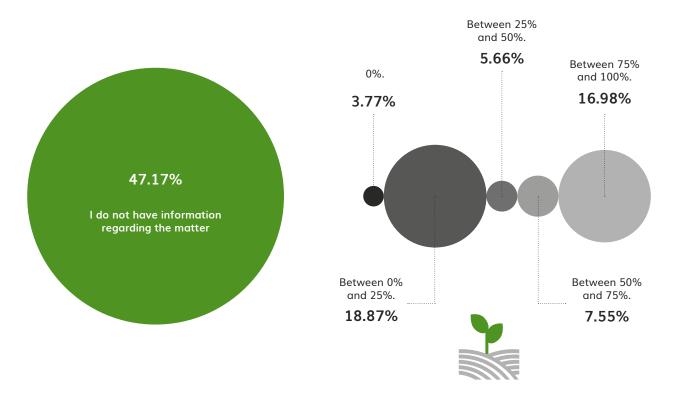
It is also highlighted that 7 out of every 10 deem it necessary to adopt these sustainability criteria at a sectorial level.

However, there are not many businesses that believe that, nowadays, there is an offer or demand from the different parts of the value chain, whether livestock farmers, suppliers or distributors, specifically, less than 1 out of every 5 businesses present this perception.

As such, it does not appear that market demand motivates the adoption of these criteria; in fact, it is a voluntary commitment on the part of the producers to position themselves in the new sustainability paradigm.

One of the goals of this report is to analyse the supply chain of soy imported by Spain and to know the weight that it has, with the soy coming from a sustainable source. That is why this question has been made to the sector, in order to understand

### Estimate of soy for feed from sustainable sourcing\*



<sup>\*</sup> Regarding soy as a raw material used in animal feed manufacturing. What approximate percentage do you believe comes from sustainable sourcing\*\*?

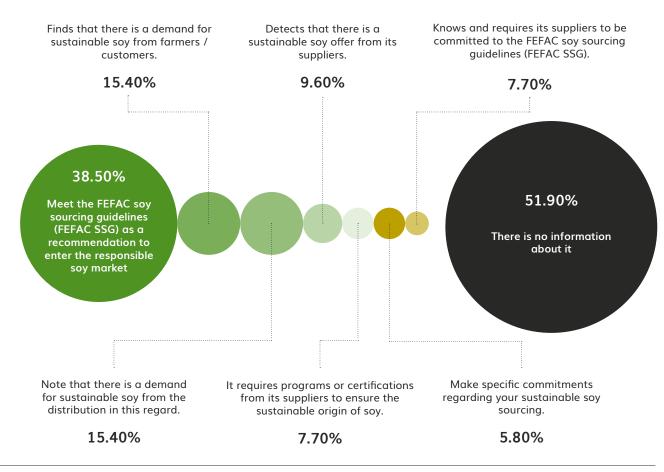
what information there is regarding sustainability of soy that is used as a raw material.

When asking about the source of soy and the extent to which they consider it has been produced by applying sustainability practices, about half of those surveyed either do not have information regarding it, 47.17%, or believe the percentage to be 0%, this being the answer for 3.77% of those surveyed.

This detail is, undoubtedly, relevant to the study and states that a lack of generalised information regarding sustainability initiatives implemented at the outset exists and these restrict the flow of communication in the value chain, which makes us reflect on the importance of better co-ordinating the efforts of all the links involved.

The remaining 50%, which state that they know what percentage comes from sustainable sourcing means, 25% estimates that between 50% and 100% of the sourcing has a sustainable origin.

### Regarding sustainable soy, as a business:



 $<sup>^{\</sup>star}$  Answers to the question: «Company's relationship with 'sustainable' soy».







By going into more detail on the perception and position of the manufacturing businesses regarding "sustainable soy", the results reveal the following details: 51.9%, that is to say, a little more than half of those surveyed, state that they do not have information on the matter, in line with the results obtained in the previous question. In terms of the offer, 9.6% indicate the existence of a sustainable soy offer.

Both details, regarding the lack of information or the low percentage related to the sustainable offer, confirm the interpretation related to the lack of communication among the links of the previously-mentioned value chain. This disconnection is evident because the information that is disseminated in the sector is not sufficient, despite the sustainability initiatives implemented by the production and commercialisation businesses.

The commitment and actions adopted at the outset are not correctly transferred and highlighted, which denotes a lack of co-ordination among the parties involved and the need to work to improve the dissemination of the advances and their "downstream" transfer, in order to intercept the existing demand and connect it, in order to enhance its positive feedback.

In this sense, it agrees with the 15.4% that observe a demand by the market, which indicates that, currently, a clear demand is not stated, it is still emerging but possibly growing, as it emerges from global tendencies in terms of sustainable supplies and responsible consumption.

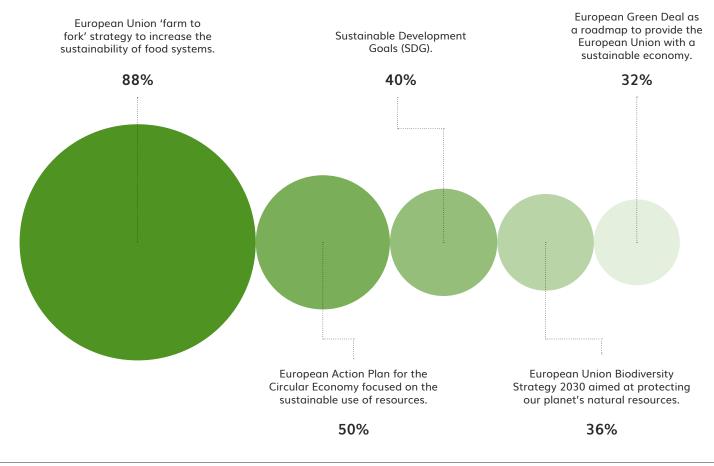
On the other hand, 38.5% know the soy sourcing guidelines from FEFAC as a recommendation to enter the responsible soy market, representing a conceptual framework to improve performance in production and transformation. A limited percentage, considering that it was launched in 2015, that indicates the need to impact more on its dissemination.

Additionally, it is highlighted that 7.7% also demand their providers to be committed to the same guidelines and/or demand sustainability programmes from their providers to guarantee the sustainable origin of soy, together with 5.8% adopting specific commitments related to their provision of sustainable soy. Signals that indicate that the transformation sector is beginning to direct itself towards new, more efficient models in terms of sustainability, but there is still a way to go.

CESFAC member feed manufacturers show awareness of sustainable initiatives.



### Sustainable initiatives recognized by companies\*



<sup>\*</sup> Answers to the question: «Initiatives with which you are familiar at the company level».

This data, with more disperse and, perhaps, fragmented responses, in relation to the previous answers, may denote that the situation is in transition and that the traction is still emerging from the market but there are positive signs that the offer is being committed to, though it is advancing very slowly, step by step, and advancing the requirements of the market to align itself with a sustainable soy demand that, undoubtedly, shall continue growing under the pressure and scrutiny of customers and end consumers, increasingly more aware of the origin and transformation of foodstuffs.

Finally, the businesses have been consulted regarding their knowledge in relation to the sustainability initiatives that are going to be more relevant for the sector in the coming years. Among those indicated in the survey, global initiatives such as Agenda 2030 and its 17 Sustainable Development Goals or the European Green Deal were highlighted as the roadmap for the development of a green economy model for the EU, which, in addition, has been adopted as the main strategy for post-COVID recovery.

Together with these, the *EU Biodiversity Strategy for* 2030<sup>41</sup>, the EU Circular Economy Action Plan or the

"Farm to fork" strategy are listed. This last initiative intends to make the animal feed sector of the EU the reference point in terms of sustainability, considering the production of raw materials outside the EU but consumed within European territory, as is the case with soy.

Among the results, it is highlighted that 88% of the businesses are familiar with the EU's "Farm to fork" strategy, which indicates that the sector is aware and has assumed that this is a key initiative for increasing sustainability of the animal feed systems and for promoting the achievement of a more sustainable value chain. No wonder, soy production in the EU is also directly indicated therein as one of the supply chains whose impact is mainly produced outside the EU but where it wants to assume responsibility at European level to minimise it. Similarly, regarding the manufacturing of medicinal animal feed, this strategy suggests specific goals to fulfil in the member countries of the EU in the short-term, hence the increased awareness of the sector. In fact, Spain already works on the transposition of the new European regulations for medical animal feed.

The level of familiarity of those surveyed with the rest of the initiatives is minor, as only the **EU Circular Economy** 

88% of companies are familiar with the EU's «Farm to Fork» Strategy, so they are aware of this initiative to promote sustainability in the sector.

<sup>&</sup>lt;sup>41</sup> EU Biodiversity strategy for 2030: https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal/actions-being-taken-eu/eu-biodiversity-strategy-2030 es

### Sustainable soy for feed manufacturing

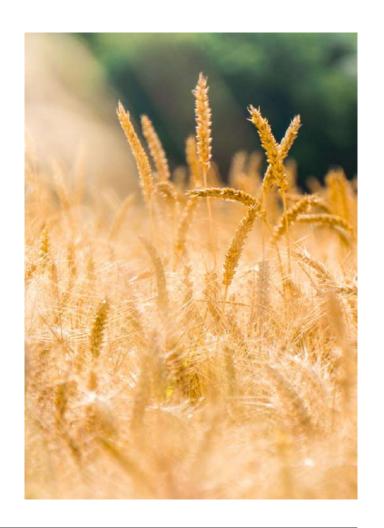
The sector
is taking
awareness and
recognizes its
responsibility
in sustainable
production.



**Action Plan**<sup>42</sup> is known by 50%, a percentage that is almost the same as those surveyed in question 2 who state that they are implementing efficiency activities in the consumption of resources or encouraging the Circular Economy, which allows us to state that, in addition to knowing the initiatives, there is interest to put them into practice.

The results show that the sector is aware and recognises the responsibility that they have in sustainable production although there is still work to do regarding aligning the actors of the value chain, highlighting the importance of developing communication among the different links. The efforts and positive results at the outset should go beyond the different links of the industry so that the commitment of everyone continues growing.

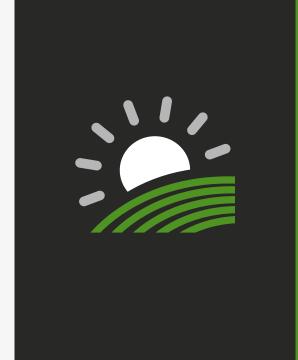
The initiatives undertaken by the production and commercialisation sector in the pursuit of improving production systems have to be promoted, supported and made public, together with a greater awareness and training of animal feed manufacturers in order to increase their knowledge and better co-ordinate, with the aim of becoming an even more proactive link in the promotion of sustainability.



<sup>&</sup>lt;sup>42</sup> EU Circular Economy Action Plan <a href="https://ec.europa.eu/environment/circular-economy/">https://ec.europa.eu/environment/circular-economy/</a>

### Towards a new sustainable paradigm







### Towards a new sustainable paradigm



A production model is required that fosters environmentally and socially sustainable economic growth. The increase in the demand for proteins of animal origin, due to population increase and the consolidation of a new middle class around the world, as the main causes, leads to an enormous challenge for the sector.

The close relationship and interdependence with the natural environment, shows the pressure the systems of agricultural origin are subjected to and places the downstream productive activities under the scrutiny of public opinion, from importers to consumers.

In order to face this challenge successfully, new means of satisfying market demand are required, to create and encourage new economic and supply mechanisms that protect biodiversity and eco-systems, as well as native populations in the producing countries.

It requires reconsidering the current model, the so-called "business as usual" or typical way of doing business, in order to formulate new solutions that, not only are they disconnected from the loss of natural capital, they also contribute to re-establishing a new balance and bringing prosperity to the interested areas, offering opportunities for environmentally and socially sustainable economic growth.

The standard production model should guarantee a production model with the best sustainability practices and the greatest commitment to deforestation, with the involvement of all the actors of the supply chain.

In this chapter, we first discover the advantages of adopting sustainable soy, to later reflect on how to advance towards a sustainable soy production model, sharing recommendations that may help actors in the chain to take the required steps.

### The advantages of adopting sustainable sourcing models

As has been described in this report, the challenges of the sector of animal feed production in Spain reside, mainly, in encouraging the acceptance and commitment of soy under sustainability criteria that guarantees that it is completely untied from deforestation, reduction of the carbon footprint and sustainable management of land and water resources.

Sustainable soy supply aligns with global targets sustainability linking with SDG 2, SDG 12, SDG 13. and SDG 15.



With the aim of valuing this prevailing need, it is worth highlighting the advantages that this change causes in sourcing, in order to be able to be aware of the benefits for the different actors involved, together with an assessment of the risks associated with the inaction or prolonged inertia that may begin to negatively affect the sector.

According to the definition of sustainable soy, described in this report, the following advantages are identified in its adoption:

- Considering its relevance as a source of fat and protein on a global level, as well as its multiple uses: human consumption, animal feed, biofuels, the transition towards a global sustainable production model represents a benefit for all the sectors, including the animal feed manufacturing sector, regardless of the final application.
- The supply of sustainable soy is aligned with the global challenges of sustainability for markets committed to responsible sourcing chains, fulfilling different Sustainable Development Goals, such as:

- **SDG 2** Zero hunger due to its contribution in the agri-food chain.
- SDG 12 Responsible production and consumption, since the sector is leading the transition to a sustainable value chain.
- **SDG 13** Climate action, as the tropical forests are important carbon sinks and a key piece to address global warming.
- SDG 15 Life of land eco-systems, as the preservation of the eco-systems comes at the hands of stopping deforestation.

These challenges and goals are collected in Agenda 2030, adopted globally and which specifies the local, national and international policies, in terms of the recommended supply types, until reaching the concept of green public purchases, in which sustainable soy is plainly aligned.

### Towards a new sustainable paradigm

- Additionally, sustainable soy represents a good example of how the sector contributes to starting initiatives collected in the European Green Deal, the roadmap for the EU for a sustainable economy and post-COVID recovery. It also responds to the adoption of commitments demanded by the EU to encourage production and consumption models of more sustainable foodstuffs, as is the case of the "Farm to fork" strategy or the EU Biodiversity strategy for 2030.
- Develop environmental control and quality standards and protocols, offer the advantage of aligning the monitoring processes of the business to new standards of non-financial accounting, that is to say, implement estimation protocols for the production type, as well as the creation of improvement and contingency plans, provide the businesses with more transparent and optimised functioning schemes, in line with the current demand requirements.
- Transparency awards businesses. To guarantee that soy was produced with an appropriate environmental management and in socially beneficial and economically viable conditions with commitments to the fight against deforestation, it is a quite clear competitive advantage within a market that is increasingly more demanding and aware of the performance and commitment of productive systems and transformation.

Having reflected on the advantages that adopting a sustainable supply chain offers, we discover how the sector may improve its performance in growth and other basic aspects to head towards a responsible model.



### Recommendations towards sustainable soy

### Getting ahead of public policies and the market

Any transformation starts by being aware of what needs to change: by taking the first step, more will come. Being at the forefront of change has always meant having a competitive advantage, whoever dared to go further, knew how to win the market and position themselves. Now is the time for sustainability.

The sector has the opportunity to encourage the adoption of sustainability practices to begin getting ahead of a transformation that is inevitable; whoever leads sustainability, especially in a sector such as animal feed, is going to lead the market.

From the consumers to the distribution channels and up to the investors, the different links begin to

### Towards a new sustainable paradigm

The trend is clear: we are moving forward in the transition to a sustainable economy.



demand transparency in the production chains because it is in their interest to align their values to products that acquire and/or promote their purchase or investment.

The trend is clear, as shown by the different policies approved recently in terms of sustainability and circular economy, such as the European Green Deal, which is also beginning to be reflected on the different national plans and programmes, such as the Spanish Circular Economy Strategy ESPAÑA 2030<sup>43</sup>.

These steps, these phases, are the stages of the transition towards a sustainable and circular economy that we direct ourselves towards. There is no going back; all the sectors, especially those that are directly related to the natural environment, have to face their reflection in the mirror and begin the paradigm change, it's a matter of time.

It is clear that it is not a solitary road. In order for new systems to be successfully secured, the co-ordination of multiple actors is required, from production to transformation and distribution, financial institutions, governments, NGOs and consumers. As such, listening to the market means being aware of the direction of the wind and its imperceptible variations, before the storm comes.

In order to begin to take the steps, tools and spaces for preservation have been created that set the basis for sustainable soy that the market is beginning to demand.

The commitments of the businesses towards sustainability offer, among others, the following opportunities:

- Added value in the market due to excellence in sustainability.
  - Access to emerging markets.
- Access to advantageous incentives that award sustainable value chains.
- · Getting ahead of regulations and gaining a competitive advantage.

In this sense, it is important to remember the difference among the levels of sustainability to which the businesses within the sector aim for. The effort and investment towards a real transformation should aim, not only to fulfil the minimum requirements, but also to have a goal of reaching sustainable and fair production, that represents the highest standards.

<sup>43</sup> ESPAÑA 2030 - Spanish circular economy strategy https://www.miteco.gob.es/es/calidad-y-evaluacion-ambiental/temas/economia-circular/estrategia/

### Towards a new sustainable paradigm

### Public-private commitment to sustainable soy

Currently, more and more European countries are adding national initiatives focused on sustainable soy, among those Spain, as shown in the initiative of the National board for sourcing and sustainability of raw materials for animal feed led by the Ministry of Agriculture, Fisheries and Food. However, the road is long and, because of this, it is extremely important to have a commitment that is accepted and adopted by all the parties in the sector.

In other importing countries, such as the Netherlands, Belgium and Switzerland, "national commitments" have been initiated since the first decade of the 21st century in order to achieve sustainability goals focused on soy.

In the Netherlands, for example, these initiatives, promoted by the national government, NGOs and consumer lobbies, as well as import businesses, have been obtaining encouraging results in the first years of implementation and hybrid financial

instruments (public-private capital at 50-50) have been created to cover the costs associated with the transition to a responsible soy market.

Other initiatives have been established to direct public-private funds towards sustainable production projects in Brazil, Argentina and Paraguay, in order for the local producers to address the changes needed.

As such, despite the delay in the fulfilment of these "promises" in some countries, it is evident that times are changing and sustainability is gaining ground on the political agendas, which transfers unequivocal signs to the sector towards a fully responsible production; this is a matter of time and vision by the agents involved who want to lead the sector.

Some examples are *IDB INVEST*<sup>44</sup> (Interamerican Investment Corporation) which offers financing and technical assistance to the private sector, at corporate level and for financial bodies and infrastructure development. In the area of agro-business, it promotes inclusion by means of the development of financial structures that benefit small farmers, enables industrial businesses in order to

increase their capacity, productivity and scale and promotes sustainable practices to face the difficulties caused by climate change.

Or the *Global Environmental Facility* (GEF) fund, linked to different UN programmes, whose work areas are: biodiversity, chemicals and disposals, climate change, forests, international waters and land degradation.

### Regulatory incentives

Regulatory changes present a challenge as well as an opportunity. Establishing new operating conditions in the producing countries has been another way of directing the market towards sustainability. The first step has been to define protected regions and areas of public interest, so as to later place the focus on private lands and the *modus operandi* of the producers.

In the first decade of the 21st century, the majority of producing countries were creating regulatory schemes to stop deforestation, introducing laws that restrict the change of soil use for growing or livestock.

<sup>&</sup>lt;sup>44</sup> Financing BioEconomy initiatives in Latin America https://repositorio.cepal.org/bitstream/handle/11362/45043/S1900984\_es.pdf.

### Towards a new sustainable paradigm

Producer engagement is critical to meeting recommendations towards a model more sustainable.



It is important to specify that, despite the regulatory advances in terms of land restrictions for exploitation by growers, the commitment may not only be compulsory, but it also requires strong support from the producers to fulfil the principles and recommendations contained in this report.

The persistence of areas that may legally be deforested, as well as illegal activities in protected lands which escape the controls of the authorities and the supply chain itself, have to be removed in order to consolidate a new and better reputation for the sector, damaged by years of improper practices which now needs to re-affirm its true commitment.

### Enabling all the links of the value chain

### **Enable the producers**

Initiatives that enable and support small producers so that they increase their productivity and may operate in a more sustainable way are key. In this challenge to meet the global demand for soy, every increase in efficiency and productivity helps to avoid conflict in the native environment with the crops.

### Involve parties from importation to the "table"

In order to encourage the adoption of sustainable soy, it is required to provide relevance to these initiatives and actions that guarantee a respectful production regarding the environment and people.

To do this, the information and awareness of the market (up to the final consumer of animal origin foodstuffs) are key for feedback and influencing decision-making towards a change of model from the consumers upwards, to the producers at the outset. The producers of animal feeds, duly enabled and informed regarding the advantages of changing their supplies to sustainable soy and with the participation of the rest of the parties involved in the chain, may make better decisions and encourage the transition to a sustainable market.

### Towards a new sustainable paradigm

As such, it is necessary to create a conversation about the importance of these practices and their potential for positive impact, not only from a reputational and economic perspective but also from an environmental and social one.

This new business culture towards sustainability should be extended to all the participants so that the message is coherent and that it is implemented in an efficient and profitable way. It is only through empowering the protection of the environment that the sector will be able to be transformed, inspiring and undertaking new strategies that show the work and commitment of the parties, in order for all of us to win.

### Making the commitment public and communicating it

In order to achieve excellence in sustainability, work is required, step by step, milestone by milestone, with the patience and persistence required to establish a policy and culture that are equally innovative and responsible.

It is not easy to leave the "comfort zone" but, today, it is necessary and convenient as the direction of the sector towards more responsible production is clear and the demand of the market in this direction is increasing. Making this commitment public is the first step, as it creates a positive internal and external pressure and it consolidates a confidence that allows for dialogue with the stakeholders to start.

On a reputation level, not only is it necessary to undertake activities, but also to communicate them with coherence, humility and honesty. In a hyper-connected world, non-transparent behaviour is tolerated less and less so that opening "the door", showing what is being done, is fundamental to bringing the customer (producers) closer to the end consumers, who, for their part, put pressure on them with their increasingly informed and critical purchasing decisions.

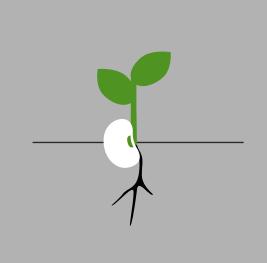
The reputation of soy needs to improve, showing all the initiatives and good practices applied and it shall have to do so through transparency and traceability, if the goal of increasing sustainable soy is to be achieved. This acknowledgement, additionally, may praise the merits

of this crop and its benefits for the nutritional challenges of the present and the future.



### Conclusions

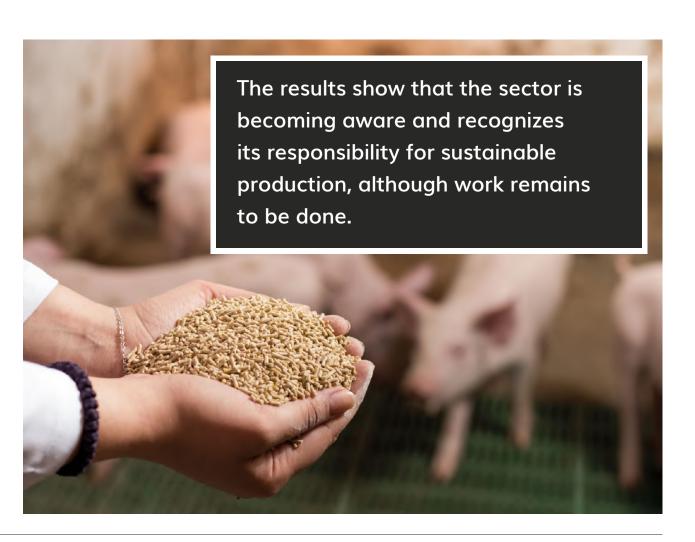




Reflections

### **Conclusions**

The implementation of ambitious sustainability initiatives and programmes by the soy producing and operating businesses responsible for supply in Spain, by means of the adoption of activities that seek to improve the production models towards efficiency and environmental and social responsibility with the local communities, is a fact and the path to follow. This is demonstrated by the main standards referenced by these companies which, far beyond fulfilling FEFAC's sourcing guidelines, adopt additional criteria that is more demanding in terms of sustainability and the fight against deforestation. Additionally, these businesses are currently involved in valuable initiatives such as the Amazon Soy Moratorium in Brazil or the Sectorial Vision of the Argentina Gran Chaco (ViSeC) in Argentina, which are presented as guarantees of the sustainable origin of an important part of soy imported to Spain.



### **Conclusions**

As a result of the analysis of sustainable soy flows in the imports to Spain from Brazil and Argentina, it is concluded that the following may be considered Low Deforestation Risk: 71% of soy imported from Brazil and 91% from Argentina in 2018. As a whole, they account for 78% of the total soy imported from both countries in this year.

A very positive evolution is detected: while in 2016, 60.64% of all the soy imported from Brazil was considered to be Low Deforestation Risk, in 2017 this percentage reached 67.5% and has continued increasing to 71% in 2018. In the case of Argentina, in 2016, the percentage of soy imported considered to be Low Deforestation Risk was 68.9% and it increased to 83.1% in 2017 and in 2018 it was 91%.

Therefore, the heightened percentage of soy imported to Spain, with No or Low Deforestation Risk, undoubtedly, is a detail that reflects the commitment, increasingly clearer, to untying from production in at-risk areas and represents the basis for the advance of the sector towards

a future committed to full sourcing that is sustainable and free from deforestation.

Regarding the practices and measures that the animal feed manufacturing businesses who are members of CESFAC are undertaking for the integration of sustainability in production, the results of the survey undertaken reveal that there is a variety of activities leading to sustainability, highlighting the increase of the efficiency of the processes by means of the optimisation of resources and energy and the reduction in the use of antibiotics. The majority of businesses show a favourable opinion towards adopting activities and they consider integrating sustainability criteria to be convenient. A little more than half of those affirm that they are applying them currently. Additionally, they are mostly familiar with the EU's "Farm to fork" strategy.

Notwithstanding, the same survey states that there is a lack of general information regarding sustainability initiatives implemented at the outset, since, when consulting the origin of soy and to what extent they consider that is has been produced through applying sustainability practices, almost half of those surveyed do not have information regarding it. This fact denotes a lack of co-ordination among the parties involved and the need to work in order to **improve the dissemination of the advances**, which leads to reflecting on the importance of better co-ordination in the efforts of all those links involved.

On the other hand, the results show that, currently, there is no evidence of a clear demand for sustainable soy by the national market, with this still emerging and possibly growing, as it emerges from the global tendencies of sustainable supplies and responsible consumption.

The results show that the sector is becoming aware and it recognises its responsibility for sustainable production, although there is still work to do, particularly, to align the actors of the supply chain, highlighting the importance of better communication among the parties.

### Reflections

As has been assessed and understood in this study, the path towards a value chain of sustainable soy is necessary and recommended, not only for ethical reasons but also due to its impact on the profit and loss accounts of businesses.

Re-thinking the productive system in an environmentally and socially responsible perspective is a winning bet as the preservation of the natural environment and its delicate balance represents the only way of assuring a prosperous future for all those involved.

The awareness of the main actors in the market: production, commercialisation, transformation and distribution in Spain, as well as the international institutions and the producers and their customers, is key for advancing.

Animal feed manufacturers, joining forces with producers at the outset and importers, have the opportunity to enhance their collaboration towards obtaining ambitious results: a production and

transformation that is more efficient, resilient and aware of the environmental and social problems so as to achieve business excellence based on new virtuous models.

Increasing communication and collaboration between the parties, encouraging the ability of the stakeholders, workers and the management in the entire value chain, shall be essential to promote the awareness of the benefits of adopting sustainable production models. Announcing the initiatives and the programmes implemented allows people to see the efforts and direct the demand, in order for the offer to continue its commitment to sustainable soy.

To do this, and following the recommendations of FEFAC within its vision for 2030, three fundamental elements are highlighted, in this model change: the efficiency of resources, water and energy, responsible supply and the minimisation of the environmental footprint, pillars of a strategy for sustainability that is causing the transformation of the sector.

In a society that is increasingly more aware of "how" food is produced and managed, transforming the practices in force towards productive systems of low impact and that are sustainable over time and that prioritise the protection and health of the natural eco-systems, represents an intelligent and cautious decision, as well as a profitable one.

The proliferation and toughening of the regulations in exporter countries in terms of deforestation, the greater regulatory demand on the main markets, such as the EU, as well as a new vision for financial capital towards positive impact investments, not only economic, lays the ground for a paradigm shift towards a new sustainable production model that, sooner or later, will be the new normal. As such, staying ahead of the curve in terms of the fulfilment of internationally-recognised social and environmental standards through considering and putting into practice efficiency measures and showing the adoption of good practices in the handling and responsible management represents an interesting and urgent path to be explored by the businesses involved.

### Reflections

Aligning the purpose and the mission of the businesses to the most relevant Sustainable Development Goals is fundamental because the horizon set out in agenda 2030 and recognised at a global level, is clear and those who know how to lead shall be successful in the market.

Additionally, two of the fundamental points of the European Green Deal, which represent the strategy adopted by the EU for recovery in the post-COVID crisis and the transition towards more sustainable production models, are the "Farm to fork" and the "EU on Biodiversity for 2030" strategies. Both compile different goals that are going to have a very relevant impact on the animal feed production sector for animal feeding in Europe.

The sum of small actions and co-ordinated and coherent commitments forms the basis for the renewal of the sector and its modernisation, with **new ways** to understand sustainability. Unlike in the past, it is no longer seen as opposing profitability but, in fact, as a key element for it.



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- FEDNA Foundation. <a href="http://www.fundacion-fedna.org/ingredientes">http://www.fundacion-fedna.org/ingredientes</a> para piensos/haba-de-soja-tostada-o-tratada-en-seco-actualizado-nov-2011
- INTA Informe estadístico del mercado de la soja (Statistical report of the soybean market). <a href="https://inta.gob.ar/sites/default/files/inta\_informe">https://inta.gob.ar/sites/default/files/inta\_informe</a> estadístico del mercado de soja.pdf
- Original source FAO, represented by "Our World in Data" in: Meat production by livestock type, World, 1961 to 2018. <a href="https://ourworldin-data.org/grapher/global-meat-production-by-li-vestock-type?time=earliest..latest">https://ourworldin-data.org/grapher/global-meat-production-by-li-vestock-type?time=earliest..latest</a>
- FAO SoyBean Projections. <a href="https://www.oecd-ilibrary.org/agriculture-and-food/world-oilseed-projections">https://www.oecd-ilibrary.org/agriculture-and-food/world-oilseed-projections</a> 9502660d-en
- Original source FAO, represented by "Our World in Data" in: Soybeans: are they used for food, feed or fuel? China (2000-2013). <a href="https://ourworldindata.org/grapher/soybean-produc-">https://ourworldindata.org/grapher/soybean-produc-</a>

- tion-and-use?tab=chart&stackMode=relative&time=2000..latest&country=~CHN&region=World
- Source: <a href="https://www.camara.es/comercio-ex-terior/base-de-datos-de-importaciones-y-ex-portaciones-en-espana">https://www.camara.es/comercio-ex-terior/base-de-datos-de-importaciones-y-ex-portaciones-en-espana</a>
- Source: FEDIOL. <a href="https://www.fediol.eu/data/">https://www.fediol.eu/data/</a>
   Where % 20 does % 20 soy % 20 come % 20 from.pdf
- UN COMTRADE. <a href="https://comtrade.un.org/">https://comtrade.un.org/</a>
- Feed production data 2018. Ministry of Agriculture, Fisheries and Food (Spanish Ministry of agricultura, fisheries and food). <a href="https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018\_tcm30-512133.pdf">https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018\_tcm30-512133.pdf</a>
- Report on feed production data in Spain 2018.
   Ministerio de agricultura, pesca y alimenta-

- ción (Spanish Ministry of Agriculture, Fisheries and Food). <a href="https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018">https://www.mapa.gob.es/es/ganaderia/temas/alimentacion-animal/2018-informedatosdeproducciondepiensosenespana2018</a> tcm30-512133.pdf
- Soybean production in Spain: <a href="https://es.statis-ta.com/estadisticas/1129314/superficie-culti-vada-soja-espana/">https://es.statis-ta.com/estadisticas/1129314/superficie-culti-vada-soja-espana/</a>
- Consult FAOStat: <a href="http://www.fao.org/faostat/">http://www.fao.org/faostat/</a>
   es/#data/QC
- The Accountability Framework was created through a process of consultation with a wide range of stakeholders, including businesses, NGOs, and governments, and following applicable good practices for multi-stakeholder initiatives. Source: Terms and Definitions. <a href="https://s30882.pcdn.co/wp-content/uploads/2020/06/Definiciones-v2.1.pdf">https://s30882.pcdn.co/wp-content/uploads/2020/06/Definiciones-v2.1.pdf</a>
  https://archive.ipcc.ch

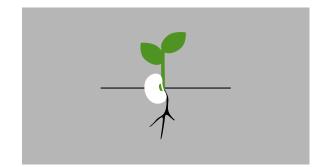
- Summary Guide IPCC Special Report on Climate Change and Land Use. Ministerio para la Transición Ecológica (Spanish Ministry for Ecological Transition). <a href="https://www.miteco.gob.es/es/cambio-climatico/temas/impactos-vulnerabi-lidad-y-adaptacion/guia-informe-especial-ipcc-uso-delatierra">https://www.miteco.gob.es/es/cambio-climatico/temas/impactos-vulnerabi-lidad-y-adaptacion/guia-informe-especial-ipcc-uso-delatierra</a> tcm30-504679.pdf
- FAO. The State of the World's Forests (SOFO) (2020). <a href="http://www.fao.org/publications/card/en/c/CA8642ES">http://www.fao.org/publications/card/en/c/CA8642ES</a>
- Escobar, N et al. <a href="https://www.sciencedirect.com/science/article/pii/S0959378019308623#:~:-text=Total%20GHG%20emissions%20from%20Brazilian,from%20deforestation%20in%20absolute%20terms">https://www.sciencedirect.com/sciencedir
- Gil, J. Carbon footprint of Brazilian soy. Nat Food 1, 323 (2020). <a href="https://doi.org/10.1038/s43016-020-0106-x">https://doi.org/10.1038/s43016-020-0106-x</a>
- Source: <a href="https://www.decadeonrestoration.org/types-ecosystem-restoration/forests">https://www.decadeonrestoration.org/types-ecosystem-restoration/forests</a>

- The 17 Sustainable Development Goals. <a href="https://www.un.org/sustainabledevelopment/es/">https://www.un.org/sustainabledevelopment/es/</a>
- The European Green Deal. <a href="https://eur-lex.europa.eu/legal-content/EN/TXT/?qi-d=1588580774040&uri=CELEX:52019DC0640">https://eur-lex.europa.eu/legal-content/EN/TXT/?qi-d=1588580774040&uri=CELEX:52019DC0640</a>
- EU strategy «From Farm to Fork». https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal/actions-being-taken-eu/farm-fork es
- EU Strategy on Biodiversity 2030. <a href="https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal/actions-being-taken-eu/eu-biodiversity-strategy-2030\_es">https://ec.europa.eu/info/strategy/priorities-2019-2024/european-green-deal/actions-being-taken-eu/eu-biodiversity-strategy-2030\_es</a>
- European Parliament report. <a href="https://www.europarl.europa.eu/doceo/documen-t/A-9-2020-0179">https://www.europarl.europa.eu/doceo/documen-t/A-9-2020-0179</a> ES.html
- Treaty on the functioning of the EU. <a href="https://eur-lex.europa.eu/legal-content/ES/TXT/?uri=-CELEX%3A12012E%2FTXT">https://eur-lex.europa.eu/legal-content/ES/TXT/?uri=-CELEX%3A12012E%2FTXT</a>

- FEFAC European Feed Manufacturers' Federation. <a href="https://fefac.eu/">https://fefac.eu/</a>
- ITC International Trade Center. <a href="https://www.intracen.org/">https://www.intracen.org/</a>
- European soy monitor IDH, The Sustainable Trade Initiative (2020). <a href="https://www.idhsustai-nabletrade.com/uploaded/2020/05/IDH-European-Soy-Monitor-v2.pdf">https://www.idhsustai-nabletrade.com/uploaded/2020/05/IDH-European-Soy-Monitor-v2.pdf</a>
- ITC Commitment. <a href="https://sm.sustainable-tra-de.org/wp-content/uploads/2021/01/Upda-te-11-December-2020.pdf">https://sm.sustainable-tra-de.org/wp-content/uploads/2021/01/Upda-te-11-December-2020.pdf</a>
- COCERAL European association representing the trade in cereals, rice, feedstuffs, oilseeds, olive oil, oils and fats and agrosupply. http://www.coceral.com/
- FEDIOL EU vegetable oil and proteinmeal industry association. <a href="https://www.fediol.eu/">https://www.fediol.eu/</a>

- Source FEDIOL: <a href="https://www.fediol.eu/data/soy-consumption%2023nov20.pdf">https://www.fediol.eu/data/soy-consumption%2023nov20.pdf</a>
- Source: : https://cesfac.es/images/Mundo-Cesfac/pdf/49\_mundo\_Cesfac.pdf
- Source: <a href="https://thesustainabilityalliance.us/es/soja-de-estados-unidos/">https://thesustainabilityalliance.us/es/soja-de-estados-unidos/</a>
- Sustainability Map | ITC. <a href="https://sustainability-map.org/home">https://sustainability-map.org/home</a>
- TRASE Database for imported soybeans from Brazil SEI-PCS Brazil soy v2.5.0. <a href="http://resources.trase.earth/documents/data\_methods/Brazil-soy-v2.5.0%20June%202020.pdf">http://resources.trase.earth/documents/data\_methods/Argentina-soy-v1.0.1%20June%202020.pdf</a>
- FEFAC Vision on sustainability. https://fefac.eu/wp-content/uploads/2020/07/16 pr 9 vision paper sustainability final draft.pdf

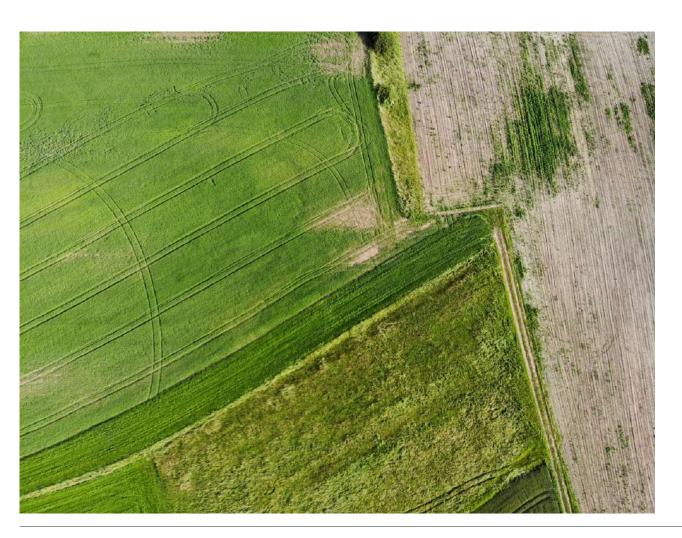
- EU Action Plan for the Circular Economy <u>https://ec.europa.eu/environment/circular-economy/</u>
- SPAIN 2030 Spanish circular economy strategy. <a href="https://www.miteco.gob.es/es/calidad-y-evaluacion-ambiental/temas/economia-circular/estrategia/">https://www.miteco.gob.es/es/calidad-y-evaluacion-ambiental/temas/economia-circular/estrategia/</a>
- Financing of BioEconomy initiatives in LATAM. https://repositorio.cepal.org/bitstream/hand-le/11362/45043/S1900984\_es.pdf







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