

## Importance of Organic Agriculture and Food in Argentina: An Explorative Analysis of the Domestic Situation and its Regional Context

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### ABSTRACT

Argentina substantially contributes to the global organic agriculture and food sector due to its large areas of organically managed agricultural land. However, most of the organic production is foreseen for export. Overall, food supply for the domestic organic market is hardly tapped. This study investigates the current importance of organic agriculture and food production as well as its consumption within the country. The novelty of the study also lies in the observation, documentation and analysis of latest stakeholder-driven developments towards organic agriculture and food. The publication allows to make the Argentinian organic market significantly more visible for the international audience.

**Keywords:** Latin America; plant-based and animal-derived organic products; export; regional economies; NGOs; promotion of organic agriculture; consumer research

### Introduction

The United Nations (UN) adopts the new agenda for sustainable development in September 2015. The closing document includes 17 Sustainable Development Goals (SDGs), which comprise 169 targets. In our recent research we focus on SDG 12 “Ensure sustainable consumption and production patterns” and place our findings on the Argentinean organic food sector in the context of this goal. The goal itself covers eleven targets dealing with efficient use of natural resources, restrained application of chemicals, the importance of relevant information on sustainable developments and behavior as well as the need of supporting lifestyles in harmony with nature (United Nations 2015). The production and consumption of organic food perfectly fits these intentions and aims. Additionally, a vital and an active actor’s landscape including governmental, private and non-governmental organizations (NGOs) plays an essential role in promoting sustainable production and consumption patterns of organic food by providing information and knowledge on cultivation methods and market access, organizing organic trade fairs and enabling interested parties and participants to create extended networks and exchange ideas and knowledge. Therefore, this paper devotes itself to analyze the production environment and consumption behavior as well as the actor’s landscape of the organic food.

In many aspects, Argentina is a leading country in terms of organic food in Latin America. Major organic exports include cereals, oilseeds, fruits, sugar cane, meat and organic wool as well as processed organic products such

as olive oil, wine or honey. Besides the exports, vegetables, fruits, juices, sugar cane, rice, polenta or honey are sold in the domestic organic market. However, it has to be mentioned that organic (certified)/not-certified food and products based on ecological principles regularly are offered altogether. This doesn't make it easy for consumers to distinguish between the more or less ecological agricultural production methods.<sup>1</sup> The group of key players of the Argentinean organic network is diverse and includes governmental agencies, certifiers, producers/manufacturers, trade/export agencies, consumers and scientific organizations as well as the non-governmental sector. A crucial input on organic sector promotion and support comes from national NGOs.

## Objectives

In the light of the SGDs, the objectives of this study are structured in three different fields. First, the study examines available data and describes the current situation of the domestic organic agriculture market and food in Argentina. Second, we identify and analyze linkages between the relevant actors and their role as driving forces of the organic sector's evolution. Third, we study the awareness and attitude of Argentinean consumers towards sustainability, organic food and labels.

## Methods

The study is based on a literature review of official sources like the different issues of the National Agrifood Health and Quality Service (SENASA), primary data collected by guideline-based interviews conducted with the University of Buenos Aires (UBA) as well as with actors of the national organic scene.

## Organic production

For 2014 the Food and Agriculture Organization of the United Nations (FAO) reported a share of about 2% for organic land in Argentina (FAO 2016). In 2015, 75,472 hectares (ha) are used for **organic crop production** and 2,830,165 ha for **organic livestock farming** in Argentina. The total agriculture area for organic cultivation of 2,905,637 ha was divided up between 1,074 organic producers throughout the country, whereas the highest concentration could be observed in the province of Misiones in the northeast (208), the southern province of Rio Negro (151), the province of Mendoza in the west (147) and the province of Buenos Aires (144). On the other hand, Chubut (1,313,302 ha) and Santa Cruz (1,163,825 ha) are the provinces with the highest amount of land under organic production, what is due to the large extensions of organic sheep farms in the south of Patagonia (SENASA 2016).

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<sup>1</sup> <http://therealargentina.com/en/the-foodie-shopping-guide-to-buenos-aires/>, <http://mybeautifulair.com/2015/05/19/living-organic-in-buenos-aires/>, <http://baexpats.org/topic/10894-free-rangeorganic-eggs/>

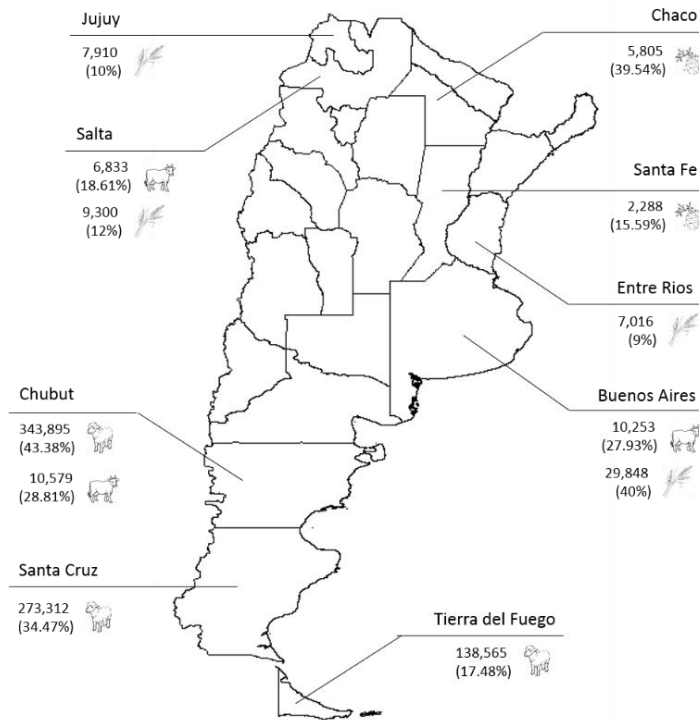


Figure 1: Distribution of organic crop production and crop land (ha) in use and the distribution of sheep, cattle and beehives between the provinces with the highest amount in the specific area in 2015. Source: SENASA (2016).

**Crop production** data for the **distribution** of organic grain, oilseeds, industrial crops, spices, vegetables and pulses, fruits and others are available. Regarding the most important arable crop, cereals, Argentina reserved 26,458 ha for it in 2015. In this category mainly wheat is cultivated. The province of Buenos Aires for its own was responsible for 40% of the entire organic crop production in 2015, followed by Salta (12%), Jujuy (10%) and Entre Rios (9%). The remaining 29% are spread across 12 of the other provinces, whilst the rest has either no organic crop production or the information is not reported (SENASA 2016; FiBL and IFOAM 2016).

In terms of **animal husbandry**, large organic producers with an emphasis on breeding and farming of sheep are located in Chubut and Santa Cruz. With a total of 792,793 thousand sheep in Argentina, 43% of them are farmed in Chubut and 34% in Santa Cruz. In addition, the provinces of Chubut and Buenos Aires are responsible for breeding and farming of over 10,000 head of cattle each, which means a share of 29% and 28% respectively of the total number of 36,715 organically grown cattle in Argentina in 2015 (SENASA 2016).

### Organic sector and its actors

The **stakeholder landscape** of the organic sector in Argentina differentiates between the private sector, non-governmental actors and state bodies, which are responsible for controlling and supporting the organic production activities (Fig. 2). All these actors are closely connected with each other. For instance, the actors on the governmental level are linked by an advisory committee for organic farming hosted by the Ministry of Agribusiness (MINAGRO). This committee includes representatives from trade control agencies, certifiers, the research environment, the export sector as well as those of NGOs and the private sector.

The group of organic certifiers consists of Argencert S.A., Food Safety S.A., Letis S.A. and OIA S.A. (Organización Internacional Agropecuaria) and is approved and supervised by SENASA. They were founded in the 90ies, played an essential role in the built-up of the organic sector and therefore count on a long-term experience as organic certifiers of plant-based, animal and processed products. They are recognized by the European Union (EU) and accredited with the US Department of Agriculture (USDA). Argencert, Letis and OIA are accredited with the International Federation of Organic Agriculture Movements (IFOAM) and Food Safety is a member of IFOAM.

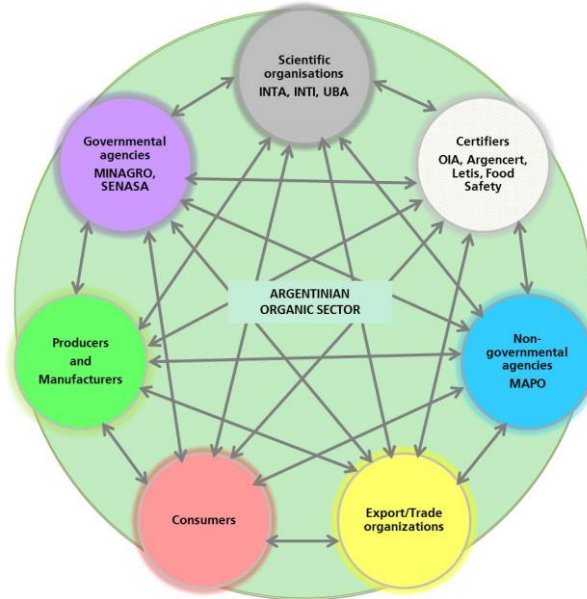


Figure 2: Schematic diagram of the organic sector's actors (own presentation).

In addition to certifiers, organic producers, manufacturers and local commerce, the export/trade agencies hold an important position in the private sector of the organic scene. Most of the organic production is not intended for domestic consumption, but for export. Nevertheless, the domestic market is characterized by a bigger diversity of products. Among export and trade actors it is worth to mention the program PROARGEX, which was completed in 2016. The program promoted highly-added-value export goods in the food sector, including fruits such as pears and grapes for small and medium sized enterprises.

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The National Institute of Agricultural Technology (INTA) and the National Institute of Industrial Technology (INTI) work on the scientific development and its implementation in practice. INTA includes projects for organic production and holds the program Pro Huerta, which is a national program for vegetable gardens for families and small communities. These are used to cover own needs and are not certified in general, but the instructions given during trainings and awareness raising are based on the principles of organic production. INTI helps to develop specific projects supporting organic manufacturers with solving technological problems. The UBA offers a 3-year-career for organic plant-based production.

A crucial input for organic sector promotion and support comes from the oldest national NGO of the organic sector, *Movimiento Argentino para la Producción Orgánica* (MAPO). MAPO is established in 1995 and represents all Argentinean provinces, whilst local representations in different parts of the country belong to the organizational structure. MAPO consists of experts in organic agriculture and livestock farming, organic certification, export, science as well as producers and manufacturers from the domestic market. Consequently, MAPO played a leading role during the foundation and development phase of the organic sector in Argentina and its connection and interaction with the international organic community. MAPO is member of IFOAM. Regarding the development of organic agricultural practices, MAPO's group of organic farmers "Pampa Orgánica" has a key role.

Another institution involved in organic production is the *Cámara de Certificadoras de Alimentos, Productos Orgánicos y Afines* (CACER), which was established in 2002. CACER is a chamber, in which three of the organic certifiers as well as other certifying companies are members and aims to improve the quality standards of Argentine products and their position within the global market. It is doing so by supporting and developing activities regarding evaluation from an independent side as well as certification. Also, the Inter-American Institute for Cooperation on Agriculture (IICA) with its representation in Argentina is conducting projects dedicated to organic production. Additionally, in 2008 the Inter-American Commission of Organic Agriculture (CIAO) was founded by the Agricultural Ministries of several countries promoted by IICA and comprises 19 member countries in 2016.

In terms of consumers, the domestic organic market is rather small but constantly growing. Generally, organic (certified)/not-certified food and food produced based on ecological principles, e.g. “without using agro toxins”, seem to be used interchangeably by consumers. For instance, this is illustrated by the consumer’s behavior and food choices, when locals in Argentina exchange ideas and tips on where to buy organic food.<sup>2</sup> Therefore, for some actors of the organic network it is unequivocally clear, which producers belong to the organic scene – that is to say certified actors – and which not. From the consumer’s perspective it looks different. A farmer, who is selling his products on an “agro-ecological” market with an additional “label”, e.g. “no agro toxins”, could be rated as a pure organic farmer<sup>3</sup>. The only exception is the organic market called “FIAB orgánica y sostenible”, which is organized in a cooperation of the municipality of the city of Buenos Aires with MAPO and which is functioning twice a week from May to December. In this case the majority of the products are organic (certified) and if not, at least one ingredient has to be organic. This exception is made only for products which are in transition to be organic. In this case the product is considered sustainable and this condition has to be clearly identified by the selling farmer.

## Legal and institutional framework and arrangements of organic sector

A legal and institutional framework forms the organic sector of Argentina, regulates it by providing space for action and promotes (or restricts) its development. The legal framework of organic production has its roots in the early 90ies, when the Organic Production Control System was created and the qualification of the country as equivalent to the EU standards came into existence. The National Organic law of 1999 (Ley 25.127) as well as its administrative regulations set the rules for the supervision of organic production. For packaging, each organic certifier has its own label, which is utilized in addition to the Argentinean label for organic products called “Orgánicos Argentinos”.

As mentioned above, the stakeholders of the Argentinean landscape are highly interconnected, therefore the entire support of organic agriculture in Argentina demonstrates a wide and diverse institutional framework and institutional arrangements. As an example for the central role of the governmental institutions as promoter of the organic agriculture, it is worth to mention the “Guía Orgánica”, which was developed to strengthen the domestic market in 2016. This interactive map was initiated as a cooperation of MINAGRO and MAPO in order to support consumers in finding organic products online. Furthermore, a bunch of organic agriculture promotion and support programs carried out by different stakeholders (alone or jointly) such as INTAs Pro-Huerta on self-production of fresh food through organic market gardens. Access to the market is also supported by programs and projects of export agencies like PROAGREX.

## Organic consumption

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<sup>2</sup> <http://therealargentina.com/en/the-foodie-shopping-guide-to-buenos-aires/>, <http://mybeautifulair.com/2015/05/19/living-organic-in-buenos-aires/>, <http://baexpats.org/topic/10894-free-rangeorganic-eggs/>

<sup>3</sup> [www.sabelatierra.com](http://www.sabelatierra.com)

For getting deeper insights into consumer's mindsets and awareness of organic products, we conducted a **survey** with the UBA. Students and employees were asked via a paper-based questionnaire in the fields of "awareness", "purchasing behavior and attitude" and "consumption".<sup>4</sup> In the field of awareness, the survey shows that 45.8% are used to the word "sustainability" in a context with food, whilst all participants (100%) know that "organic" could be linked to food. On the other hand, the fact that there are labels in the market, which certify a sustainable and/or an organic origin, is known by a minority (27.7%). The value is slightly higher, if the label "Orgánico Argentina" is shown to the participants (28.9%). Obviously, the revelation of a specific label functions as a reminder.

In terms of **purchasing behavior**, 20.5% said that they bought one or more products certified by a label consciously. By far, the most frequently given response on the question "why" was "quality" (82.4%). Obviously, products with a sustainability label are perceived to be of high quality. On the other side and consistently, "quality" was not mentioned once by the participants, who did not purchase products labeled as "sustainable". Quite the contrary, the lack of knowledge about sustainable products and problems with visibility and availability seem to be the obstacles for higher demand. Another hint for the strong connection of "labeled product" and "quality" is the fact that 57.8% of the participants would pay up to 20% more for products labeled as "organic" in comparison to conventional food.

Furthermore, the survey contained some **questions on meat** in particular. First, it was of interest, where the participants are used to purchase meat. The responds are very clear and 75.9% are used to buy meat at a butcher. In accordance with the findings of price sensitivity, "price" is not the most important aspect in the purchasing process of meat (21.7%). The most importance is given to "quality" (74.7%), followed by "freshness" (43.4%). We could observe differences in the responding behavior of male and female participants. The latter emphasize "quality" (67.8%) not as much as male (91.7%), whilst "freshness" is of slightly higher importance. On the other hand, male were more price sensitive than female (29.2% against 18.6%).

## Conclusions

Unless the relatively long track record (e.g. SENASA publications) of the information collected regarding the Argentinean organic market, a lot of questions could not be answered to our complete satisfaction. For example, the actual definition and size of the organic market is not totally clear. The delimitation in the field between certified organic and ecological principles should be concretized. This study shows that the actual evolvement of the domestic organic sector in Argentina already contributes to the realization of the SDGs, especially Goal 12. Many initial steps such as development of the interactive map on organic products "Guía Orgánica" or introduction of the restaurant's organic certificate "Bio - Solo Orgánico" were undertaken in this direction. Moreover, the vital scene of actors within the organic sector, the NGOs, the governmental institutions, researchers, certifiers and civil society builds an excellent basis for the study of several forms of networks and organizations. Complex legal and institutional frameworks need to be further documented and analyzed. Finally, the consumers and their attitude towards organic products should be further investigated regarding the Argentinean characteristics to understand, how the progress of the whole sector could be supported and pushed.

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