Organic Flower Bulbs From Holland - Outlook for the French Market

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Outlook for the French Market

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Groningen, May 2002

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Abstract

The Netherlands is a major exporter of flower bulbs in the world. France is amongst the top10 of the biggest importers of Dutch flower bulbs. However, the growing of bulbs is very damaging to the environment. With the use of 1,5 million kilograms of pesticide and 16 million kilograms of artificial fertiliser, the flower-growing sector is among the most polluting types of agricultural industry in the Netherlands. Growing of environmentally friendly produced bulbs in the Netherlands is nearly absent. Only a very dramatic change in government policy or a drastic change in the market situation could stimulate its growth. This report focuses on the possibilities and barriers of exporting organic bulbs from the Netherlands to France. This is done with a SWOT (Strength, Weaknesses, Opportunities, and Threats)-analysis. The positive outlook for organic food products in the French market can be considered as an opportunity for the introduction of organic bulbs. To take advantage of this opportunity and to avert the threats, organic bulb farmers have to 'eco-innovate', i.e., to develop functional substitutes for existing products and services.

Preface

This report is a result of a study carried out by the Community Research Centre Economics of the University of Groningen. The Milieufederatie (Environmental Federation) Noord-Holland approached the Community Research Centre with the request to find out the possibilities to increase sales of organically produced bulbs on export markets.

Three French students Alexandre Halimi, Thibault Lamarque and Adrien Kampmann carried out the research. They visited the University of Groningen in the framework of a student exchange programme and were interested in social, especially in environmental, problems. Thus, they approached the Community Research Centre with the question if they could participate in the project. In their opinion, caring for the environment does not belong to isolated behaviours anymore but it becomes more and more important with the appraisal of new ecological catastrophes. Ardien, Alexandre and Thibault told us that they remembered the crash of Erika petroleum ship two years ago in the west of France. This crash fuelled the wide solidarity of French people with every natural element belonging to the landscape. Therefore, Thibault, Alexandre and Adrien were anxious to know what the real interest of the French in environmental problems is and how far-reaching this interest is for their own environment. The interest of Adrien, Thibault and Alexandre in environmental problems combined with their marketing background made them suitable for this research project. Given their French nationality we decided to focus the research on the French market.

I would like to thank Alexandre Halimi, Thibault Lamarque and Adrien Kampmann for their contributions to this research project, Cock van der Kaay (Milieufederatie Noord-Holland), Albert van Dijk (staff member of the marketing department) for their comments, and my colleague Frans Sijtsma for coaching the students.

Groningen, May 2002

Elise Kamphuis

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Chapter 1 Introduction

The Netherlands is a major exporter of flower bulbs in the world. France is one of the biggest importers of Dutch flower bulbs. However, the growing of bulbs is very damaging to the environment. With the use of 1,5 million kilograms of pesticide and 16 million kilograms of artificial fertiliser, the flower-growing sector is among the most polluting parts of agricultural industry in the Netherlands. Growing of environmentally friendly produced bulbs in the Netherlands is nearly absent. Only a handful of farmers are active in this field. This is why the Milieufederatie Noord-Holland approached the Community Research Centre with the request to do some research concerning the market outlook of organic bulbs.

Around the turn of the century, organic agriculture in European Union (EU) seemed to be at a turning point, which was echoed during an important conference on 'Organic Agriculture in the European Union – prospects for the 21st century´, organised in Austria, in 1999. The conference noticed that the number of ha in the European Union (EU) for organic agriculture, or in conversion phase, had increased from nearly 0.9 m ha in 1993 to around 2.9 million ha in 1998, or some two per cent of the EU agricultural area. There was a general recognition that the percentage could grow to anywhere between five and ten per cent by 2005 (EU conference, 1999).

Time seems to be ripe for introduction of a new green product, the organic flower bulb. This research project is about the possibilities and barriers for green marketing (i.e. marketing that appeal to the ecologically sound way of producing) of Dutch organic bulbs for export markets, with special attention to the position of France. Chapter 2 describes some features of green marketing.

To answer this question we had to examine the internal strengths and weaknesses of the organic bulb-growing industry, and the opportunities and threats of its environments. A useful instrument in the field of marketing analysing the internal and external factors of an organisation is the SWOT (Strength, Weaknesses, Opportunities, and Threats)-analysis. A SWOT-analysis can assist in forming a vision of the future.

Chapter 3 analyses the external factors, i.e. opportunities and threats of the organic market in Europe and in France. The chances to introduce or increase the sale of an organic product in a country are bigger, when the organic market in this country is well developed. Opportunities and threats of the market position of organic bulbs depend on several factors, like the market share of organic products in France, the supply of and demand for organic products, consumer attitude, government policy on a

national and a European level, retail channels of organic products, the familiarity with a national or European organic logo, the price, etc.

In chapter 4, we started to examine the internal strengths and weaknesses of the organic bulb-growing industry. To do this we compared the organic bulb with its main competitor, the regular bulb. However, one might argue that organic and regular bulbs are complementary: the one would not exist without the other. Regular bulb farmers can benefit from innovations in the organic bulb farming and vice versa. To gain more insight in the possibilities of the export of organic bulbs to France, the French students discussed the issue with decision-makers, bulb experts and other relevant people in France.
Finally, in chapter 5 we analysed our results with the SWOT-tool to structure some strategic decisions on whether or not to export organic bulbs to France.

Unfortunately, there are still no official foreign trade statistics concerning organic products. It remains therefore impossible to give a complete picture of international trade in organic product. (Kortbech-Olesen, 2002) Moreover, all the publications and research on organic farming refer to organic food. Information on organic non-food products is very scarce. All in all it is clear that the organic bulb market hardly exists. Due to these factors, the conducted research was explorative. To confirm the explorations, a market research will have to be conducted later on.

Chapter 2 Green Marketing

Consumers are less and less prepared to accept products from purely profit-oriented business. According to the Millennium Poll on Social Responsibility, 60% of 25,000 consumers in 23 countries expect businesses to tackle various environmental and social issues such as fair labour practices, business ethics and environmental cleanup in addition to being profitable and providing jobs. Firms that produce or sell organic products have to show their involvement in social responsibility, which they can reveal by applying green marketing. This chapter goes into the development and the meaning of green marketing. It is mainly based on articles written by the green marketing expert Jacquelyn A. Ottman. (http://www.greenmarketing.com/)

§ 2.1 Green marketing

The intention to develop production and exportation of a new green product such as organic flower bulbs is not the result of an independent idea, but takes place in a whole process that tends to be constantly developing and innovating, which is called green marketing. Green marketing goes into the increasing critical attitude of consumers. It is the name given to any product, for which it is intended to use an environmentally better process for production, distribution, consumption or recycling phases during its cycle of life. Therefore, green marketing has no limit. It started in the late 1970s with the recycling of glass bottles, but today green marketing is reaching a very wide range of products. We could even say that every product has a potential to become green and sustainable.

During the past few years, the 'environment' has turned into a larger issue: sustainable development. Revolving around the need to shepherd our resources today, so that future generations will be able to live as comfortably as we do, sustainability development encompasses three components: environment, economic development, and equitable distribution of resources around the world. Sustainability of new products is being driven by: concern over the state of the environment; pressure from regulators to take back products for recycling and to curb air emissions, among other measures; potential new market opportunities for sustainable technologies, such as those involved with energy and resource management; and new demands from customers and the myriad of corporate stakeholders. (Ottman, 2000) Sustainability in agriculture is the process by which the demand for its outputs, food, fibre and other outputs, is met by farming practices that are economically efficient, respect the environment, and are socially acceptable. (OECD, 2001)

These new regulations, new technologies and consumer pressure drove innovative environmental managers and product designers to reduce the negative environmental impact of their products. At the same time, designers focused on particular eco-aspects of products, such as increasing the amounts of recycled or recyclable materials; reducing in-use consumption of energy; reducing material intensity

of products; and the impact of product take-back schemes. Experience with these and other concepts form the basis of numerous guidelines, software and consultancy services covering 'Green Product Design'. However, for marketers of green products, there are only a few strategic tools, and even these have evolved in an ad hoc manner. Furthermore, greener products should replace their 'dirtier' counterparts when they are to make significant inroads to reduce negative environmental impacts. Green designs, and more sustainable designs, will only survive if there is a market for the products that leading edge companies have developed. This explains perhaps why the annals of green marketing are chock full of examples of new products whose environmental credentials were greeted with tons of fanfare, but eventually failed to attract the attention of consumers. IBM's PS/2, Deja Shoe, Heinz Cleaning Vinegar, are just a few. At the end of the ‘80s and the beginning of the ‘90s, numerous products like green bathroom cleaners, paper towels, and baby diapers that were claimed to be eco-friendly, ozone friendly, resource saving etc., languished on store shelves. Therefore, green marketing involves more than just claiming in ads that a products is ‘green’ and that consumers have to pay a premium for saving the planet.

Another problem of green marketing is that the green consumer remains an ambiguous subject, although the green consumer has been the focus of many recent books, research projects, and corporate reports. First, it is not clear what a green consumer is (i.e. should we consider consumers of phosphate-free detergents 'green' or only those consumers who purchase detergents made from completely natural ingredients.) Second, we do not know if the green consumer is willing to pay a premium for more environmentally sound products, and if so, how much. Third, it is not known what percentage of the purchasing public can be identified as green consumers. Finally, we do not know where the green consumer trend is heading.

Green products or organic products have three characteristics that green marketing must take into account. First, green products are perceived as expensive. Second, most of the assumed beneficial attributes cannot be evaluated directly by most consumers themselves. To give some examples, consumers cannot see how the air pollution is reduced due to using a less polluting gasoline or how energy is saved when they recycle aluminium cans. Neither can they notice that organic products are healthier or tastier than conventional ones, or that organic farming actively contributes to animal welfare, bio-diversity or landscape maintenance. Third, consumers have to trust that all promised advantages of a green product are true. Moreover, environmental marketing claims are often confusing. Therefore, consumers must rely on ads and their impressions of the corporations behind the greener products to feel that claims can be trusted, or that products marketed as such are truly less harmful to the environment. However, some consumers are sceptical of industry's environmental claims and suspect retailers of price gouging.

These specific characteristics of green product marketing show how important the kind and intensity of communication is for the consumer conviction and market development of green products. If consumers do not trust the claimed advantages, they only perceive the price disadvantage. (Richter, 2001)

§ 2.2 Rules of thumb

The above mentioned characteristics of green products can be addressed by credibility, communication, education, highlighting the direct benefits and eco-innovate.

§ 2.2.1 Eco-Innovate

The next round of environment-related innovation – the one needed to address the new challenge of sustainable development – will require not just cleaning up operations or refining existing products and packaging (the hallmarks of environmental innovation during the past decade or so), but entirely new ways of meeting consumer needs while consuming significantly less resources and energy. As in nature, survival in business requires the constant fuelling of new growth. Astute businesspeople are always on the lookout for opportunities for new products, new uses for existing products, new markets and other opportunities for incremental profit. The environmental marketplace represents a fertile area for entrepreneurs and existing businesses alike. 'The Economist´ magazine has gone so far as to proclaim that 'For far-sighted companies, the environment may turn out to be the biggest opportunity for enterprise and invention the industrial world has ever seen.´ The potential for more efficient products and technologies is described by the Harvard Business Review as 'the biggest opportunity in the history of commerce.´ Opportunities to develop sustainable products can be found in the areas of energy efficiency and renewable energy, alternative agriculture, recycling, mass transportation and information technology. In terms of efficiency, the potential to enhance customer satisfaction can be viewed in several ways. It can avoid offering product components or product remains that customers do not want. For example, the firm Gateway builds each computer from scratch in order to meet the exact specifications of their customers. Other examples of advantages of efficient products are: cheaper operation e.g. computers that automatically turn off when not in use; avoidance of unnecessary packaging which makes disposing of the product cheaper for consumers; and the possibility of having the product taken back by the manufacturer for recycling or reuse.

This results in the specific task for businesses to 'eco-innovate', i.e. to develop functional substitutes to existing products and services. Examples are voice-mail as a substitute for answering machines, integrated pest management as a replacement for pesticides, specially treated chewing gum as a substitute for toothpaste and brushes, etc. As these examples demonstrate, eco-innovation requires highly creative thinking and the ability to view one's business or the issues to be resolved from a brand new perspective.

§ 2.2.2 Credibility

Due to the fact that most consumers cannot directly evaluate the benefits of green products, credibility is very important. It is not enough to talk 'green'. Awarding eco-labels by third parties is one approach to increasing credibility of environmental claims. Currently, in approximately 30 countries around the world governments are offering such labels. The Organisation for Economic Co-operation and Development (OECD) has recently released a report discussing the effect of eco-labels on consumer behaviour. Although eco-labels have been only moderately successful among individual consumers, they have a greater impact on 'business to business' and government procurement practices. Producers are increasingly using eco-labelling schemes. Germany's Blue Angel, America's Green Seal, Japan's Eco-Mark are all tokens that producers have opened up their processes for review, reinforcing their company's credibility in the eye of the consumer.

Another approach is more on the firm level. Companies must be green or at least be perceived as making a concerted effort in the right direction. Strategies in the arsenals of the companies, who serve properly to their consumers and the environment, include: thoroughness, being pro-active, a visible CEO, empowerment of the employees, constant integration, learning and refinement, and communication. Introducing a new green product without the support of a positive track record of corporate environmental performance may undermine a program's credibility. That is the message sent back from the environmental front of sceptical consumers. Finally, companies that market products as green without the credentials to back it up also risk retaliation from consumers, environmentalists and the media who may feel a company is exploiting the environment.

§ 2.2.3 Educate consumers and sales people

The issue of communication is closely related to that of credibility. Consumers are concerned about the environment, but they do not know how to choose one product over another that will benefit the environment. In several European countries, suppliers of organic food do not spend much money for promotion campaigns, either for public relations, or for advertising, or for sales promotion activities. Larger food firms spend between 5% and 10% of their turnover for communication campaigns, while most of the smaller organic suppliers invest much less than 1% of their turnover for communication. (Hamm, 2001) In Germany, for example, more than 30% of all consumers are willing to pay premium prices for keeping animals more natural and for a better taste of products. Another third of the population is tending to accept higher prices for these quality characteristics. The stated willingness to accept higher prices for organic products, however, is much lower. This illustrates that many consumers do not know that the standards for organic production include very high standards for animal husbandry and assuring animal welfare, because German consumers were not acquainted with these standards due to the lack of communication. (Müller and Hamm, 2001)

Consumer education results in their empowerment and empowered consumers choose environmentally preferable products, when everything else is equal. (Ottman, 1998) The vital part of the consumers'

education process is to prepare the sales people for selling green products convincly. As long as salespersons do not feel convinced that organic products have several advantages and premium quality, they cannot convince consumers. This is especially difficult in supermarkets with a high fluctuation of salesperson. (Hamm, 2001)

§ 2.2.4 Highlighting direct benefits, fun and a positive lifestyle

To reach not only the highly involved or sceptical consumers but a big group of consumers, it is vital to stress in the communication the direct and tangible benefits provided by greener design, such as energy efficiency or recycled content, rather than stressing the environmental attributes themselves. For example, super-concentrated laundry detergents not only save energy and packaging, they save end space, money and effort (they are easier to carry). Organically grown food not only better preserves soil and reduces the amount of toxins in the water supply, they have superior taste and health benefits compared to their counterparts. Patagonia sells outdoor garments such as fleece sweaters made from recycled soda bottles. The material has insulating ability superior to virgin materials while providing comparable breathability. (Ottman, 1998) In addition, the communication of green products must not only focus on the information parts, but should symbolise fun and a positive lifestyle to reach young consumer groups. (Richter, 2001)

Electronics industry giant Philips Electronics (headquartered in Amsterdam, the Netherlands) is one of Europe's leading proponents of green marketing and green design. Since 1998 Philips has been running a corporate-wide EcoVision program. The program required that each Business Group designed or redesigned one ‘Green Flagship’ product per year. To support the program, the company conducted an extensive consumer behaviour research. This research confirmed the stated willingness to buy green products when bundled with other benefits. Philips researchers found that linking such environmental attributes as energy reduction, materials reduction, and toxic substance reduction with various material (lower cost), immaterial (convenience), and emotional (quality of life, feel good) benefits desired by consumers, raises consumer purchase interest to 60% or above – a figure that includes consumers who may be negatively predisposed to the environment. (Ottman, 2000b)

§ 2.3 Conclusion

To be successful, green marketing involves more than just the environment. It involves the establishment of credibility, a focus on direct benefits, a combination of green products with other positive characteristics and the potential to eco-innovate. Above all, green marketing needs to communicate information as well as emotions. Consumers set aside their prejudice that green products cost more (or have an inferior quality, or both), as soon as they experience other benefits of the green products apart from their environmental soundness.

Chapter 3 Organic agriculture

Opportunities for developing organic flower bulbs market depend above all on the market position of organic products in general. If the market position of organic products is very weak, the opportunity to gain a market share for organic bulbs will be very small. The market outlook for organic products depends on several factors like, market share, retail channels, supply, reputation of the organic logo, government policy, price, consumer attitude, etc. This chapter starts with an overview of organic agriculture in Europe and the position of France on this market. Next, the chapter focuses more on the organic agriculture market in France to find out the opportunities of using organic bulbs in France.

§ 3.1 Organic agriculture in Europe

§ 3.1.1 What is an organic product?

Organic agriculture can be defined as an approach to agriculture, whose aim is to create integrated, humane, environmentally sustainable agricultural product systems. Maximum reliance is placed on self-regulating agro-ecosystems, locally or farm-derived renewable resources and the management of ecological and biological processes and interactions. Dependence on external inputs, whether chemical or organic, is as reduced as possible. Thus, organic products are either agricultural commodities or foodstuffs, originating from synthetic chemical-free farming.

Although one could call an organic product a natural product, as those cultivated by our ancestors before the appearance of the industrial agriculture and the farm-production industry, organic farming uses very advanced methods. In the area of crop production, different practices (also increasingly used in 'conventional' farming) are applied: fertilisation with manure; growing of legumes to bind nitrogen from the air; compost of vegetables or low soluble fertilisers; preventive measures to control pests and diseases such as schice of appropriate species and varieties; rotation; mechanical weed control and the protection of beneficial organisms.

§ 3.1.2 EU policy

The integrity of organic products is safeguarded by legislation and standards, which require regular inspections of all producers and manufacturers, and certification according to strict standards. Therefore, organic agriculture is the only agricultural production method that is based on international standards, i.e. the International Federation of Organic Agricultural Movements (IFOAM) Basic standards that have existed for 25 years. During the 1990s CODEX Almentarius (a joint FAO/WHO body) also developed international organic guidelines. There are no major differences between these sets of standards. (Rundgren, 2002)

The goal of certification is to ensure that each producer or merchandiser of organic food or fibres meets the standards for organic production, processing and handling. Certification always includes on-site inspection of the production operation. Certified organic products can command premium prices in the market which, given arrangements along the production chain, may be translated into a premium for the farmer. Usually, a two-year transition period from conventional to organic production is required for certification.
The EU legislation defining organic agriculture is largely based on the IFOAM system of inspection and certification. In 1991, the Council of the EU adopted a regulation on organic production of agricultural products and indications referring thereto on agricultural products and foodstuffs (EC Regulation no 2092/91, 24 June 1991). In adopting Regulation (EEC) No 2092/91, the Council created a Community framework defining in detail the requirements for agricultural products or foodstuffs bearing a reference to organic production methods. These rules are quite complex; not only do they define a method of agricultural production for crops and livestock, but they also regulate the labelling, processing, inspection and marketing of organic products within the Community and the import of organic products from non-member countries. The Regulation was implemented on the 1st January 1993.

The EU legislation applies to unprocessed agricultural products from vegetable origin, as well as processed food products composed of one or several ingredients. Only processed foods with more than 95% organic agricultural ingredients can be classified as organic while those with more than 70% but less than 95% can be described as 'partly organic'. Non-organic foods are those with less than 70% of their contents being from organic ingredients. The Regulation has been added to on several occasions, in particular in 1999, when the Council extended its scope to cover organic livestock production. EU regulations also exclude the use of genetically modified ingredients in organic foods, which may be a key selling point with some groups of consumers. (Comber, 1998)

The rules were introduced as part of the reform of the common agricultural policy, which by the late 1980s had broadly achieved its original aim of generating agricultural productivity gains so as to make the European Community largely self-sufficient for its food supply. The policy therefore shifted towards other aims, such as the promotion of quality products and the integration of environmental conservation into agriculture. Both these objectives involved major development potential for the organic farming sector, which had previously always been marginal.

Although, the EU-Regulation 2092/91 provided the right labelling to ensure that organic products were produced under the strict standards of organic agriculture, the EU-logo for organic products was never communicated to consumers in broad public relation campaigns. Moreover, the EU-wide logo could easily be mixed up with other EU-logos for traditional specialities, for protected geographical

indication or for protected designation of origin. Therefore, the EU logo is not known in the public and thus of no practical value. This is why European countries implemented a common label for organic products on a national level. (Hamm, 2001)

§ 3.1.3 Organic market

Due to the excesses of the industrial agriculture, more and more persons wish to consume natural products, which respect human health and the environment. In total there are more than 20 million ha of certified organic land today.

Supply

Table 1 shows the organic farming Europe for 2001 in ha and as % of total agriculture areas. The countries with the largest areas of organic farmland are: Australia, Argentina, Italy, Canada and USA. France has a relatively small share of organic farmland compared to other EU-countries. Only in Greece and Ireland the share of organic farming is lower than in France.

Table 1 Organic farming in Europe (2001, ha)

Markets	*Organic area*	*%*	*Organic farms*	*%*
Austria	271,950	8.68	19,031	8.42
Belgium	20,263	1.46	628	0.83
Denmark	165,258	6.20	3,466	6.40
Finland	147,423	6.73	5,225	6.60
France	371,000	1.23	9,283	1.37
Germany	546,023	3.14	12,732	2.93
Greece	24,800	0.27	5,270	0.64
Ireland	32,355	0.37	1,014	0.69
Italy	1,040,377	6.67	51,120	2.21
Luxembourg	1,030	0.18	51	1.70
Netherlands	27,820	1.42	1,391	1.48
Portugal	50,002	1.31	762	0.18
Spain	380,838	1.30	13,424	1.11
Sweden	171,682	5.20	3,329	3.70
U.K.	527,323	3.33	3,563	1.53
Total EU	3,778,144	2.81	130,290	1.86

Source: Stiftung Ökologie & Landbau (SÖL, 2001)

Demand

The world retail market for organic food and beverages increased from an estimated US $ 10 billion in 1997 to an estimated US $ 17.5 billion in 2000. Assuming an annual global growth rate of up to 20% during the year 2000, world retail sales are estimated to have reached about US $ 21 billion in 2001. (Kortbech-Olesen, 2002) Compared to estimates of some other market analysts, this is a rather conservative estimate. The EU market of organic products represented 6 million in 2000. Table 2 gives the world market for organic products estimates (by country) for 2000. The market share for certified organic products lies between 0.5 - 3% in Europe with the highest market share in Denmark, Austria, Switzerland, Germany and Sweden. The number of regular consumers of organic products in the Western and Northern European countries varies between 3-10%. (Richter at all, 2000) Therefore, one can conclude that organic products still occupy a niche position in Europe.

As Table 2 shows, in absolute terms, France represented the fourth market (0.8 million) of organic products and Germany with more than 2 billion retail sales became the biggest market. . Moreover, the expected growth of retail sales over de medium term is with 15-20% fairly high. On the other hand, organic sales as % of total food sales in France is quite small (0.9 - 1.1%). Thus, while France has high sales values, it also has an enormous potential.

Table 2 Overview world markets for organic food & beverages (2000, estimates)

Markets	*Retail sales (million US $)*	*% of total food sales - ca.*	*Expected growth (3-5 years)*
Germany	2,100-2,200	1.6-1.8	10-15
U.K.	1,100-1,200	1.0-2.5	15-20
Italy	1,000-1,050	0.9-1.1	10-20
France	800-850	0.8-1.0	10-15
Switzerland	450-475	2.0-2.5	10-15
Denmark	350-375	2.5-3.0	10-15
Austria	200-225	1.8-2.0	10-15
Netherlands	275-325	0.9-1.2	10-20
Sweden	175-225	1.0-1.2	15-20
Belgium	100-125	0.9-1.1	10-15
Other Europe*	400-600	-	-
Total (Europe)	7,000-7,500	-	-
U.S.A.	7,500-8,000	-1.5-2.0	-20
Japan	2,000-2,500	-	-
Total ca.	17,500	-	-

Source: Compiled by ITC, January 2002, based on trade estimates

Retail channels

Conventional supermarkets have a leading role in delivering a broad penetration of organic products to all consumer segments. (HAMM, et al., 1999) Table 3 shows the present relevance of organic products of leading European retailer companies. The table shows for France that the two main supermarkets have a relatively low number of organic products in their outlets (Carrefour 120 and Auchan less than 200) and that the share of organic sales was relatively low (Carrefour and Auchan < 1.0%).

Table 3 Relevance of organic products in major European retail chains

Company	*Number of organic products in big outlets*	*Share organic sales %*	*(year)*
Waitrose (UK)	1300	4.0	1999
Tegut (GE)	1200	7.7	2000
Sainsbury (UK)	1000	<1.5	1999
Tesco (UK)	1000	<1.5	1999
FDB (DK)	800	5.4	1998
COOP (CH)	650	5.3	2000
Migros (CH)	650	2.2	2000
Billa/Merkur (AT)	400	3.7	1998
Rewe (D)	200	>1.0	1998
Dansk Supermarkt (DK)	200	?	
Metro (D)	160	0.1	1998
Carrefour (F)	120	<1.0	1999
Spar Osterreich (AT)	60	1.0	1999
Auchan (F)	<200	<1.0	1999
Co-op Italien (I)	<200	0.5	1998
Esselunga (I)	<200	?	

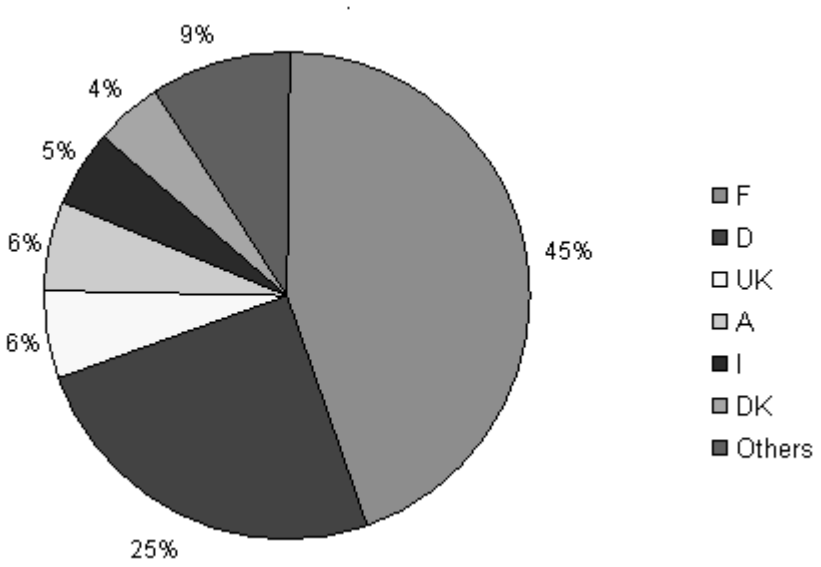
Source: Richter 2001, ZMP Ökomarkt Forum, several volumes 2000/20001

§ 3.2 Organic agriculture in France

§ 3.2.1 Developments

Organic agriculture in France developed furthest in the'80s, particularly in areas of quality level of the products, number of organic farms and level of information amongst the population. As figure 1 shows, France represented the EU Member with the largest share of the organic farming area (45%) in 1985. However, in the mid-'90s the number of farms stagnated and the area of organically farmed land grew only slowly. This was caused by the implementation of council regulation no 2092/91 and major

changes in the organisation of the sector. Reynaud (1998) suggested that a tendency to protectionism of organic farmers, a strong conventional farmers' union, a lack of a united organic front, and a lack of specific government support were the main reasons for the decline. In 1997 the share of organic farming area of France in the EU was decreased to 8% (see figure 1). Domestic demand, however, increased yearly with 20%.



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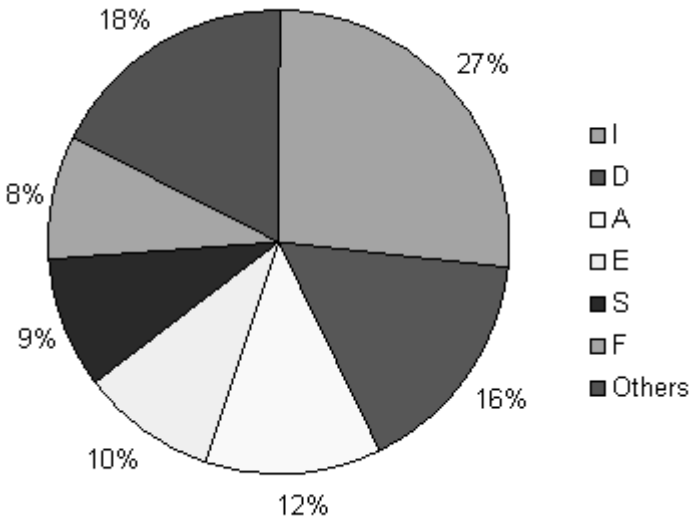


1997

Figure 1 Share organic area of Italy, Denmark, Austria, UK, Spain (E), Sweden, France
Source: Lampkin, 1999

Government policy

The decrease in the share of organic farming area of France in the EU was why in December 1997, the French government launched a five-year action plan to make France Europe's leading supplier of organic foods and raw materials by the year 2010. The plan involved subsidies totalling FF 80 million (12,3 million) to stimulate and improve organic production, distribution and sales. (Reynaud and Schmidt, 2001)

Thanks to the plan organic agriculture in France - once Europe's leader - was on the rise again. In 2000, 1125 French farmers started to converse to organic agriculture, so that compared to 1999, organic agricultural areas increased by 17% and reached more than 370,000 ha. This is 1,3% of the French useful agricultural surface. However, figures 2 and 3 show that after four years of strong progress the growth of organic areas and farms again slowed down by 20%, in 2000. This break was partially caused by a change in the financial device that subsidises farmers in their conversion to organic farming. In 2000, the device became registered in the Territorial Contracts of Exploitation. However, this new tool could not really be set up before the adoption of the Plan of National Rural Development by the European Commission. Therefore, numerous farmers postponed their project of conversion to the organic agriculture.

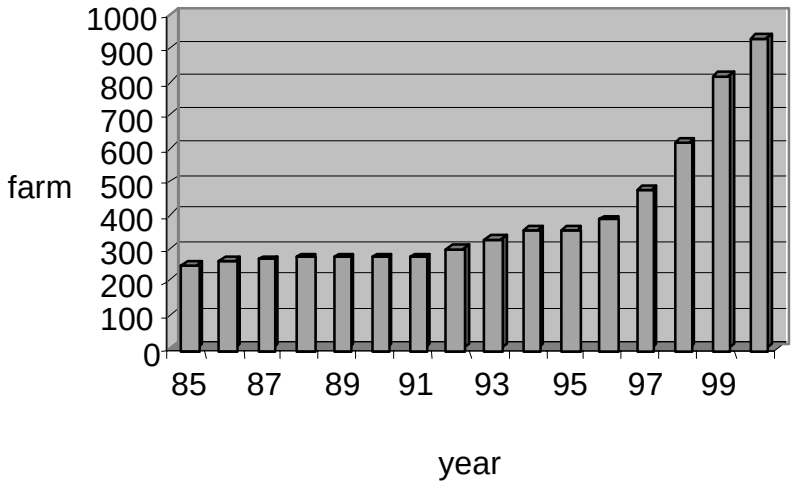


Figure 2 Number of certified and policy-supported organic and in-conversion farms in France (1985-2000*)

* 2000 is estimated

Source N. Lampkin, Welsh Institute of Rural Studies, University of Wales, Aberystwyth, GB.

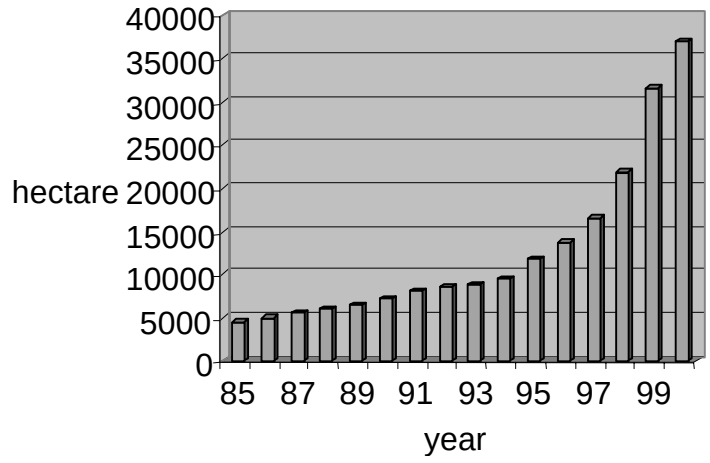


Figure 3 Certified and policy-supported organic and in-conversion land area in France (1995- 2000*, ha)

* 2000 is estimated

Source: see figure 2

Import

In 1998 organic imports into France were valued at 50 million. From countries within the EU fruit juices, dried fruit, cereal bars, muesli and other processed, new-to-market products, such as ready-to-eat frozen foods and vegetarian meals, were imported. Germany and the Scandinavian countries were the predominant country sources, although 40% of the French imports came from non-European countries. Total imports accounted for about 10% of the organic food market in France. (Piason, 1999) The relatively small production in France is the reason for the considerable amount of import of organic products. (Kortbech-Olesen, 1998) Some consider the lagging of national production as a serious bottleneck for the development of the market.

§ 3.2.2 Credibility

In 1996 the French Ministry of Agriculture and Fishery established the official organic farming logo AB (‘Agriculture Biologique’), which means that an organic product does not contain synthetic chemical elements. The logo officially recognises organic farming origin of products, so that farmers or food processors can make publicly known that they use organic production methods.

The French government claims that the logo is credible and makes consumer choice easier thanks to fast eye-catching identification for the following reasons. First, the logo ‘AB’ and the procedures governing the granting and withdrawal of the logo were set up by the French State, therefore the logo belongs to the French Ministry of Agriculture and Fishery. Second, the organic farmers or processors

are controlled and certified by a French government-approved organisation[1]. Third, these certifying organisations have to meet standards of independence, impartiality, efficiency, and proficiency in compliance with EEC amended Regulation no. 2092/91, June 24, 1991, and standard NF EN 45011. Suppliers can use the governmental logo of France without additional costs.

The logo on the label of a French product guarantees:
- compliance with EEC n°2092/91 amended regulation, June 24, 1991;
- compliance with French officially licensed specifications for animal farming and animal products, in compliance with Article L 645-1 of the Rural code;
- that foodstuffs come from farming using special practices, such as spreading green manure, employing natural pest control, a strictly limited use for fertilisation, treatment, storage and conservation products;
- at least 95% of ingredients in a foodstuff stem from organic substances controlled by a certifying organisation ratified by the Ministry of Agriculture and Fishery.

It seems that the policy of the French government has been very successful: most of the organic products offered are labelled with the AB logo and more than 75% of all consumers know the logo. (Agra-Europe 2001)

§ 3.2.3 The present market.

Demand

As table 2 shows, 'organic' is still a niche market in France compared with some other European countries. However, the market has been growing at a rate of 12% per year, and this rate is expected to reach 20% per year in the future. In 2000 42% of French households bought at least one product with the AB label while 19% ate organic products, which is very often compared with the 3% in 1995. The expenses on organic products represent only 0,7% of the total expenses of the households but they increase with 25% per year.

Piason thinks that growing demand in France combined with the government action plan will have boosted organic food sales to about 2.6 billion Euro by the year 2003. He distinguishes three main categories of French consumers of organic products: the politically or ideologically motivated ones, who are concerned about the environment and animal rights; the health conscious ones; and the switchers, who are easily manipulated by the media and influenced by price and availability. About half of the consumers of organic food products are managers or self-employed professionals between the ages of 25 and 49. (Piason 1999)

[1] These inspection bodies are Ecocert SARL, Qualité France, Ulase, Agrocert, Certipaq and Aclave.

Retail channels

Organic products were mainly sold via small-specialised natural food and health food shops until the '90s. At the end of the '90s, supermarkets gained more and more importance for the marketing of organic products. Carrefour, with 132 super- and hypermarkets, was the French supermarket chain, which made most progress in the organic market. The initiatives of Carrefour were inspired by organic gardener and general director Daniel Bernard. Other important French supermarket selling organic products are Auchan, Casino and Monoprix. Most of the supermarket chains have their own organic food label, carrying an array of products from dry foods to dairy products to meat and fresh products. The biggest supplier of organic products to supermarkets is Distriborg, established in 1997. Distriborg also operates its own chain of about 130 nature food stores under the name of La Vie Claire. (Grijp et al, 1999)

Furthermore, the Superettes, small-specialised bio-supermarkets with self-service and a surface of 200 to 500 square meters, partially replace, but also supplement the small-specialised shops. Many of them and other sales persons are members of the association Biocoop that organises the distribution of organic products in France. It has 170 selling points in the whole country and it has given itself special standards. Biocoop is the successor-organisation of Food-Coop since 1987. (Reynaud et al, 2001) At the end of the `90s, nearly half of the organic food was sold through supermarket chains, whereas the rest was sold through health food stores, direct sales, and open-air organic food markets (see table 4). Retail prices for organic products are on average 25 to 35% higher compared to those of the conventional food.

Table 4 Estimated Shares of Major Channels of Retail Organic Foods Distribution in France (1998)

Distribution channel	*%*
Supermarkets	45
Health food stores and open air markets	35
Other grocery outlets	10
Direct sales	10

Source: GAIN-Report # FR 9070/ Piason, 1999

Processing

The organic food-processing sector traditionally consists of small and medium-sized artisanal enterprises, which produce one or two specialty products and sell them locally. Large agri-food companies are investing in organic foods and using their names to launch brands available nation-wide. There are around 700 organic food processors most of which process milk or grains. Grain processors include millers, bakers, breakfast cereal producers and cookie manufacturers. The organic

food-processing sector is growing at an average annual growth rate of 17.5%. (Reynaud and Schmidt, 2001)

In 2000 more than 800 new processing companies transformed products stemming from the organic agriculture (see figure 4). These companies decided to switch from conventional to organic production. In general, the number of the French producers of organic products amounts over 5,500 today. Almost all the categories of products have been covered. On a sample of hundred of new bio-products that appeared on the shop shelves during the year 2000, two third of which are vegetable products or special products based on fruits and vegetables, such as small cans of baby food, sauces, juices, soups, conserves, etc. One third of the new products are of animal origin, in particular dairy products and cooked pork products. (Observatoire national de l'agriculture Biologique, 2001)

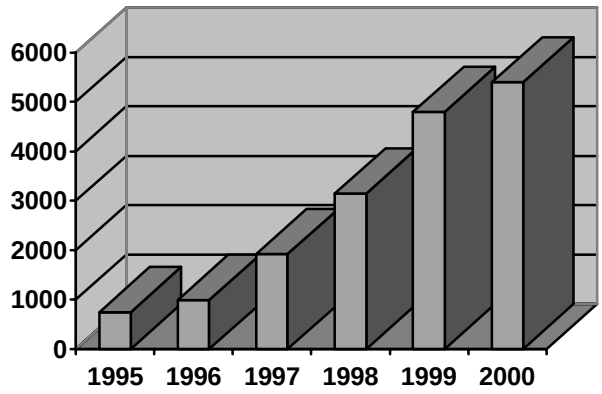


Figure 4 Processing companies of biological agriculture
Source: Observatoire National de l'Agriculture Biologique, march 2001

§ 3.3 Conclusion

The shift within the objectives of the EU agricultural policy towards promoting quality products and integrating environmental conservation into agriculture imply a major development potential for the organic farming sector, which had always been marginal before. However, the EU logo is not known to the public and thus has no practical value. Therefore, national governments developed their own logos. The French government has introduced its logo very successfully: most of the organic products offered are labelled with the AB logo and more than 75% of all consumers know the logo. The policy of the French government towards organic agriculture is very positive. Not only has it succeeded in promoting the AB logo, in 1997 it also launched a five-year action plan to make France Europe's leading supplier of organic food and raw materials by the year 2010. The organic food market in absolute terms is rather big, although organic sales as percentage of total food sales in France is relatively small. At the end of the `90s, nearly half of the organic food was sold through supermarket

chains, which led to a broad penetration of organic products into all consumer segments. Retail prices for organic products are on average 25 to 35% higher than for conventional food products. Despite the positive developments on the demand side, France has a relatively small share of organic farmland compared to other EU-countries. This could become a serious bottleneck for the further development of the market.

The general feeling, however, is that the growing demand in France combined with the government action plan will boost organic food sales. These positive developments in the French organic market can be considered as an external opportunity for the introduction of organic bulbs on the French market.

Chapter 4 Bulbs and organic bulbs

The strengths and weaknesses of the organic bulb-growing industry can be found when comparing it with the conventional bulb-growing industry. The two industries are closely linked to each other, as, on the one hand, they are competitors, whereas, on the other hand, they can learn and benefit from each other. For example, the organic bulbs can to some extent take a free ride on the reputation of the regular bulbs and farmers who produce regular bulbs can learn from the organic farmers how to deal with environmental problems. However, they also compete because consumers that buy organic bulbs substitute them for regular bulbs and vice versa. This chapter starts with a short introduction of the bulb-growing industry in the Netherlands after which the relation between the traditional and organic bulb industry will be pointed out. The chapter concludes with a scan of the Dutch export outlook for organic bulbs to France.

§ 4.1 Bulb-growing industry in the Netherlands

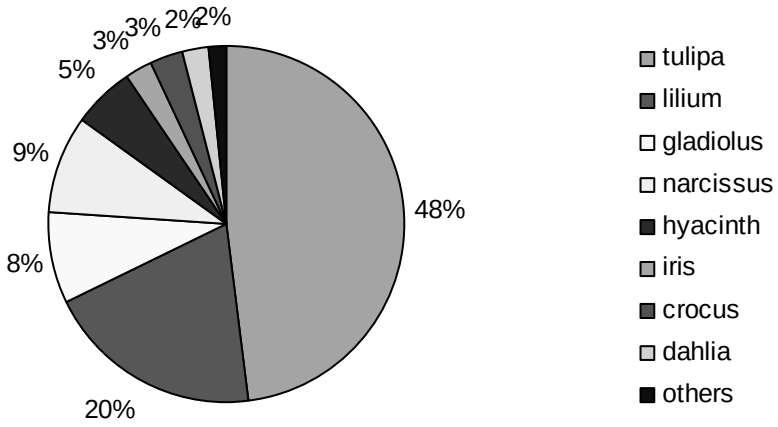
The bulb

A flower bulb is an underground storehouse and flower factory. The bulb contains everything the plant needs to sprout and flower at the appropriate time. In the basal centre portion of the bulb are the leaves cradling a baby bud. Surrounding the bud is a white, meaty substance called the scales. In true bulbs, it is these scales that contain all the food the bulb will need to flower and thrive. The basal plate anchors the scales and the floral stalk that holds the bud. This plate at the bottom of the bulb also holds the roots of the plant. A thin outer skin, called the tunic, protects the entire package. Both tubers and bulbs belong to the flower bulb production. Flower bulbs store the reserve food in the so-called scales. Examples of bulbs are the tulip, hyacinth, iris, lilies and narcissus. The tuber stores the reserve food in the underground stalk or root. Examples of tubers are gladiolus, crocus and dahlia.

Bulbs fall generally into two groups: spring-flowering (bulbs, which are planted in the fall, e.g. tulips, narcissus, hyacinths and crocus) and summer flowering (bulbs, which are planted in the spring, e.g. dahlias, gladioli and lilies). A more accurate grouping, however, divides bulbs into hardy and tender varieties. As a rule, spring-flowering bulbs are hardy bulbs, which are planted in the fall, generally before the first frost, and which can survive (and actually require for their sprouting) the cold winter months. Many hardy bulbs, such as daffodils, perennialize well and can be left in the ground to flower year after year. Most summer-flowering bulbs are tender bulbs. Since these bulbs cannot survive harsh winter conditions, they must be planted in the spring after the last frost of the season. They must be dug up in the fall and stored indoors during the winter. (http://www.bulb.com/) Table 5 shows the different varieties of bulbs and the cultivated areas.

Table 5 Production of flower bulbs in the Netherlands (ha and %. 2000)

tulipa	10313
lilium	4207
gladiolus	1765
narcissus	1935
hyacinth	1141
iris	590
crocus	647
dahlia	463
others	348



Source: http://www.france.bulb

The producers

Between 1980 and 2000 the number of ha in the Netherlands where bulbs are cultivated increased from 14,300 to 22,543 ha, although during 1999 - 2000 the number of ha slightly decreased with 1%. (Statistics Netherlands and the Dutch Product and Horticultural Branch) Although on aggregate the number of ha grew, the number of bulb farms decreased from 3,040 farms in 1996 to 2,710 in 2000. As a consequence, the area per bulb farm increased from 1 ha in 1960 to 8 ha per bulb farm in 2002. This increase in area per bulb farm could only be realised by continuing professionalism, increases in scale, automation and new production systems. (www.bulbsonline.org.)

In 1997 the bulb-growing industry earned 100 for every 97 in costs. A year later, earnings increased by one euro. In 1999 the sector was earning 3 to 8 per each 100. This makes the bulb-growing industry the best earning sector of the Dutch horticulture.

Almost 17,000 employees work in the bulb-growing industry. This is about 7% of the total number of employees in the horticulture sector. The vast majority, i.e. 13,228 people work in the primary sector (the non-primary sector is the flower and bulb wholesale businesses), which is almost 12% of the employees in the primary sector of the horticulture industry. Forty percent of the employees are the owners of the bulb farm or family members of the owner; 43% has a permanent job and 17% a temporary job in the bulb-growing industry. About one third of the employees in the horticulture industry either own the production company, or are family members of the owner (34%); more than half (56%) has a permanent job and only 10% of the employees have temporary jobs.

Export

There are two types of markets for flower bulbs. More than half of all the flower bulbs is used for the production of cut flowers or pot plants; this is the forcing market. The other flower bulbs find their

way to gardens owned by individual consumers and parks, which is the dry sales market. Between 1996 – 2000 the number of exporters decreased from 358 to 322, which is a decrease of 10%. (http://www.tuinbouw.nl/) As in the bulb-growing sector, increases in scale also take place among the exporters. About 25 exporters handle more than 50% of the export activities. Among the exporters, too, there is an increasing amount of specialisation into either the forcing sector, or dry sales sector, and according to the country to which the bulbs are being exported. The growers sell most of the flower bulbs to the trading companies before the harvest. (http://www.bulbsonline.org/)

In 2002 the Netherlands produces an estimated 10 billion flower bulbs. This is about 65% of the total world production. More than 75% of the Dutch bulbs were exported which resulted in an export value of approximately 0.64 billion. These bulbs were exported to more than 100 countries with over 50% of the export going to countries outside the EU. (http://www.bulbsonline.org/) The market share in the world trade of flower bulbs was 93% in 1995. (Dutch Product and Horticulture Branch) This puts the sector at the top of the list for the Dutch share in worldwide horticulture. The largest export markets were the United States, Japan, Germany, the United Kingdom, Italy and France. (see table 6) In 1980 Germany was the largest importer of Dutch bulbs with an import value of 77 million; France with 44 million was the second largest importer. In 2000 this picture had been completely changed. The majority of the Dutch flower bulbs were still exported to the EU- 423 million -, but in value terms the U.S. had become the largest buyer of Dutch bulbs (import value 139 million). Japan with 90 million and Germany with 97 million import value followed the U.S. France imported for 52 million flower bulbs and became the 6th important market for Dutch flower bulbs. The value of flower bulbs exported to France increased from 33 million in 1980 to 54 million in 1998, but decreased in 1999 with 5% to 51 million. However, in 2000 the export of Dutch flower bulbs to France increased again to 52 million; i.e. an increase of 2%.

Table 6 The top 10 importing countries of Dutch flower bulbs (1980-2000,)

	1980	*1990*	*1995*	*1998*	*1999*	*2000*	*+/- %*
US	33	70	100	125	130	139	7%
Japan	2	30	96	85	91	90	-1%
Germany	77	83	93	85	83	79	-5%
UK	28	41	42	56	59	59	0%
Italy	32	75	52	56	54	53	-1%
France	44	54	54	54	51	52	2%
Canada	2	7	15	17	18	22	25%
Sweden	23	20	22	22	21	21	-1%
Spain	2	5	11	13	15	15	1%
Taiwan	0	3	12	13	15	15	2%
Totaal	**306**	**473**	**605**	**645**	**658**	**674**	**2%**

Source: Dutch Product and Horticultural Branch

The export share of the flower bulbs in the amenity plants decreased from 23% 1980 to 13% in 2000 and the export share of flower bulbs in the horticulture sector decreased from 10% in 1980 to 6% in 2000. (Dutch Product and Horticulture Branch) However, as figure 5 shows, the exports value kept increasing, although with a decreasing growth rate of the value of export.

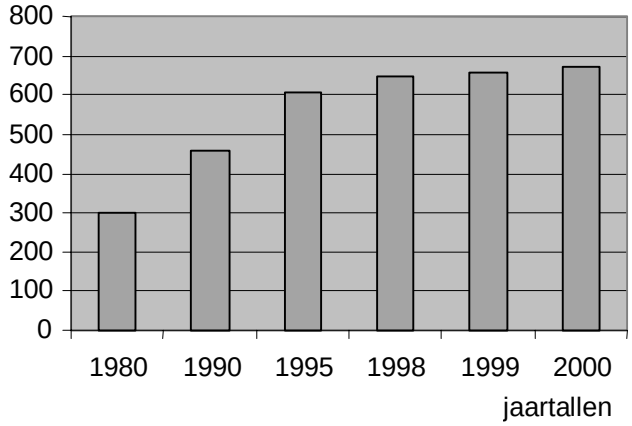


Figure 5 Export of flower bulbs (1980 - 2000)
Source: Dutch Product and Horticultural Branch

Finally, the Dutch import of flower bulbs increased from 16,4 million in 1980 to 30 million in 1999.

§ 4.2 Organic bulbs

Organic bulbs are bulbs that are grown without the use of chemical pesticides or fertilisers. Moreover, organic bulb farmers economically use scarce raw materials like energy and minerals. These bulbs have proven to survive without the protection of all kinds of crop protection agents. They also survive in gardens of consumers without chemical substances and therefore do not poison the soil.

This means that the production method of organic bulbs differs from that of regular bulbs. First, the amount of bulbs per ha is less than in the case of regular bulbs. Organic bulbs need more space to grow airy in order to prevent fungus diseases. They also need more ground because during the spring organic soil contains less nitrogen than regular soil. Second, weed between the crops has to be manually removed. The weed is especially a problem for bulbs grown on sand soils. Third, each infected bulb or flower has to be removed in order to prevent spreading of a disease. One of the most serious threats to an organic bulb is botrytis, i.e. an infectious fungus disease. To prevent botrytis the flowers have to be removed during the flourish time. Fourth, the tubers and bulbs of more special bulb varieties like alliums, fritillaries or erythronium are very sensitive for harm when they grow above the soil. Therefore, the regular bulb-growing industry uses fungicides and bactericides to disinfect the flowers. The organic growers have to plant and dig up these varieties manually. (www.ecobulbs.nl)

From all this follows that organic bulb growing is relatively labour intensive compared to regular bulb growing. On the other hand, the bulb farmer saves money on crop protection agents, the cost of which (per business) amounted to 22,149 in 1996, 22,766 in 1997, 25,003 in 1998 and 27,436 in 1999. The costs of insecticides, fungicides, herbicides, nematocides and other chemical substances per ha amounted to 1,634 in 1999. (LEI, Farm Accountancy Data Network) Due to the lack of pesticides, organic bulbs and, thus, flowers are sometimes smaller and more fragile than regular flowers. The main causes of losses and inferior quality are: mechanical wounds, bad drying, germination and appearance of roots, loss of water (land reclamation) and decay. The consequence of the different production method is a yield of about 20% lower and a price of about 40% higher than regular bulbs. The organic bulb farmers are organised in the growers association 'biobulb'. All its members are registered and certified by the European and Dutch authorities.

§ 4.2.1 The rise and fall of organic bulbs

In 1992 two Dutch farmers decided to grow organic bulbs on about 0.5 ha. In the beginning of the 90's, in the Netherlands several environmental Non Governmental Organisations (NGOs) started a campaign against the use of pesticides in flower growing industry. Their motto was 'natural flowers without toxins'. They argued that pesticides and fertiliser enter into the soil and water and put the drinking water quality at risk, which was, according to them, unnecessary because of the availability of good alternatives. Moreover, the negative external effects of growing regular bulbs are passed on to the society.

In order to promote organic bulbs, the NGOs asked flower-auctions to give preferential treatment to organic-flowers. Next, they approached the Minister of Agriculture with a request to prohibit the sale of some of the worst pesticides and restrict the use of others. In additional, the NGOs asked the Ministry to put together a research and information budget for environmentally friendly flower growing.

In the course of time, opportunities for applying crop control agents diminished. Permission to use some crop control agents had to be withdrawn, the quantities allowed had to be reduced, and the permission to use them became more and more subject to increasingly stricter regulations. Therefore, various organisations in the bulb-growing industry joined the Milieuplatform (an environmental consortium for flower bulb growers). Within this consortium, organisations launched initiatives aiming at approaching environmental problems in a balanced way. Concrete agreements (covenants) were made with the government in regard to limiting energy consumption and using of chemical agents. As a result, nowadays environmental management is perhaps the most important concern for bulb growers. (www.bulbsonline.org)

In 2000 the chain of supermarkets Albert Heijn started selling organic flower bulbs in pot for 2.92 and organic flower bulbs for the garden. In 2001 a research on organic bulb growing was financed

with 0.55 million. One of financiers was the Rabobank who believed there were export opportunities for organic flower bulbs.

Due to all these initiatives, traditional flower growers have become interested in the production of organic-flowers. Many of them thought that in the future only organic bulbs would be sold, although this process could take a very long time. Therefore, they paid visits to the few ecological tulip growers. During the period 1992 – 1998 the amount of organic bulb farmers increased. Consumer and environmental organisations thought that it was possible to increase the market share of organic bulbs to 20% in 2010 as confirmed by the ACKNH: 'Market signals indicate that it is possible to increase the market share for organic bulbs from 2 to 20%, given a price difference between organic and regular bulbs of 20%. At the moment the price difference is at least 50%.' (AKC Noord-Holland, Sept. 1999)

However, despite al these initiatives, the results of more environmentally friendly produced flower bulbs have been rather disappointing.
First, the improvement of energy efficiency of regular bulb growing varied strongly from year to year. In 1997 the improvement was 3.3%, in 1998 11.1% and in 1999 2.8%. In 1999 the share of sustainable energy was 0.27%, which was behind schedule. (Brouwer et al, 2002)
Second, according Cock van der Kaay[2], the industry still spends annually 3 billion on about 2 million kilos of herbicides. This makes 75 kilos per ha, which is five times more than common in the other agricultural sectors. Therefore, the use of crop protection agents per ha is relatively high in the bulb-growing industry when compared to other horticulture sectors. This is why the bulb-growing industry share of crop protection agents in the national share is quite high. (Jong, 1999) Table 7 shows the use of chemical substances (kilos active substance per ha) during the period 1993-1999. The total use of chemical substances per ha decreased from 151.7 to 108.9 k, i.e. a reduction of 28%. The use of soil disinfectants almost halved, while the use of insecticides and herbicides remained more or less the same. The use of fungicides and others decreased with some 20%. Although the bulb farmers seemed to succeed in diminishing the use of crop protection agents per ha, the decrease was nullified by an increase in the total amount of flower bulb areas. (Brouwer et al, 2002) Therefore, the national use of chemical substances increased because generally the use of chemical substances in the growing-bulb industries is higher than in other crop industries. (De Jong, 1999) Moreover, Brouwer believes that bulb farmers with a high use of crop protection agents have more ha of bulbs. Therefore, one could infer that economies of scale results in more use of crop protection agents and perhaps, thanks to scale increase, lower labour costs. The reason for the higher use of chemical substances is probably that larger farmers are less flexible and often grow more sensitive varieties. (Brouwer et al, 2002)

[2] Milieufederatie Noord Holland

Table 7 Use of chemical substances (kilos active substance per ha, 1993-1999)

year	*total*	*ground disinfectants*	*Herbicides, leave killing chemicals*	*Fungicides, acardicides*	*insecticides*	*others*
1993	151.7	55.5	9.2	45.1	1.5	40.3
1994	133.2	45.2	8.4	41.5	1.5	36.6
1995	131.7	42.0	8.4	43.3	1.9	36.1
1996	118.0	42.7	8.6	38.7	1.7	26.3
1997	112.1	35.0	8.9	40.3	1.9	6.0
1998	108.6	29.3	8.9	40.1	1.3	29.0
1999	108.9	29.3	10.6	35.8	1.7	31.5

Source LEI, Farm Accountancy Data Network

Third, with its relatively small annual production of about 4 million organic bulbs compared to the annual production of 8 billion regular bulbs (Van der Kaay, 2001), its relatively small production area of 2600 ha in 2000 (recall that the total area of regular bulbs in that year was about 22.500 ha), a market share of 2% and a decrease in the amount of bulb farmers in 1999, one can call the organic bulb-growing industry still an infant industry.

A recent research of EKOLand has concluded based on market expectations and market development that the growth of the organic bulb-growing industry in the period 2000 - 2010 will be absent or nearly absent with only 12 completely organic bulb farmers in 2010 compared with 10 farmers in 2000. Only a very dramatic change in government policy or a drastic change in the market situation could stimulate growth. (Ekoland, March 2002 and data from Netherlands Statistics).

§ 4.2.2 Outlook for organic bulbs in France

Although the Netherlands has a comparative advantage in producing and exporting flower bulbs compared to every other country, the market prospects for growing organic bulbs in the Netherlands does not seems to be very positive. The yield is low compared to regular bulbs and an organic bulb is nearly 40% more expensive than a regular bulb. This price difference could be considered as almost prohibitive. One way to reduce production costs is realising economies of scale. An increase in economies of scale can only be realised if a number of conventional bulb or organic agriculture farmers convert to grow organic bulbs. A good market outlook in one of the top importing countries could stimulate this process. A breakthrough of organic bulbs in, for example, France could lead to an increase in economies of scale and therefore bring about lower prices.

However, it was not easy to examine the export possibilities of Dutch organic bulbs to France. First, it was not possible to find primary data concerning the French market for organic bulbs in books, Internet, etc. Second, even the 'centre international du bulbe a fleur´, i.e. a Dutch organisation based in Levallois and which is responsible for the promotion of bulbs in France, could not provide the necessary data. Third, direct contacts with Mr Jean Glavany, the French Minister of Agriculture and Fishery and his office manager Mr Francis Latarjet did not yield any results, either. The main reason was probably that the market of organic bulbs simply does not exist in France. Although the French government was planning to open an experimental farm in Brittany, it turned out that this was a confidential test case. Therefore, the French government did not want to communicate about its activities, or to confirm whether one of its activities was developing organic bulbs in France.

From a few interviews held with customers in a garden centre in Paris it turned out that they had no idea of the meaning of organic bulbs. This, and the lack of data concerning organic bulbs, was why some experts from the French agricultural industry were interviewed instead of carrying out an extensive survey among potential customers. First, some managers of France's most important garden centre 'Truffaut´ were interviewed. Truffaut is the most 'marketed´ chain of garden centres (student research concerning garden centres, University Paris IX Dauphine) and one of its directors of development (he preferred to remain anonymous) and the shelf space manager of the biggest Truffaut shop (Stade de France) Mr Bouchiha and his boss Mr Jury were contacted. Second, the owner 'SICA saint Pol de leon´, Mr Guibert, was contacted. 'SICA saint Pol de leon´, is one of the biggest and first bulbs producer in France.

'SICA saint Pol de leon´ has been producing bulbs for 30 years, but it would stop its bulb activities in 2002, because of the drop in prices and the slow decrease of the French demand on the market of the regular bulbs. According to Mr Guibert, specialist in bulbs, prices have decreased by some 30 to 40% during the last ten years reaching an average price of 10 cent per bulb. He is of the opinion that consumers will not be interested in organic bulbs because they cannot see or imagine the benefit of the purchase: 'They can't eat the bulb thus; there is no beneficial effect for the body. Moreover, the bulb is smaller and more expensive than a regular one, while consumers prefer big flowers'. In short, Mr Guibert was very negative about the idea of importing organic bulbs.

According to Truffaut's director of development, the most important problem with selling organic bulbs is the consumer's frame of mind: 'Today, French people are open minded about organic-food and are willing to pay a higher price because it has a direct benefit for the body. In the case of organic bulbs the benefit is for the land where the bulbs are grown. A French middle class housewife (most important segment: 24% in 1993 Data from 'centre international du bulbe a fleur´) is not interested in the environmental problems of the Netherlands. Therefore, she is not willing to pay a higher price to

get a smaller flower and to save the Dutch environment. Furthermore, it would be difficult to spend money on marketing because of the high production price.'

Mr Bouchia adds that Truffaut tried to sell organic seeds. They had a very good display in the shop: an end-of-aisle display (see picture): 'This was a total failure, even with all the marketing efforts they did in the shops.' Nevertheless, they will try it again with a new packaging, although there is no guarantee for success. He said that although seeds and bulbs are different, consumers consider them to fall in the same range of products: 'Organic seeds and organic bulbs target the same segment. Even if green organic products like ecofertiliser and ecopesticide have lots of success, this does not apply necessarily to organic bulbs. Consumers use green organic products for kitchen-garden or to grow their own organic vegetables'.

According to Mr Jury, demand for organic bulbs can only be created and stimulated with the help of national and European legislation, which makes sense when considering the competitiveness of the bulb market in general.

The interviews were confirmed by a recent survey from the CSA (L'Express 7/01/2002), which concluded that 73% of the consumers eat organic for health reasons and 43% for ethical and ecological reasons. Thus, in general, French people are more concerned about their health than about the environment. However, Gerard Mermet, a sociologist, believes that due to the organic 'answer to a strong demand about safety of food', one could suppose that the 43% will actually increase and that in the future more and more people get an ethical and ecological mind setting.

Pictures of organic seeds packaging in a Truffaut shop

§ 4.3 Conclusion

Over 75% of all Dutch flower bulbs are exported. The largest markets are the United States, Japan, Germany, the United Kingdom, Italy and France. The regular bulb industry is characterised by high economies of scale. However, it seems that large-scale bulb farmers largely use crop protection agents, which is why an increase in the total amount of flower bulb has nullified the diminished use of crop protection agents per ha. Therefore, the contribution of crop protection agents of the bulb-growing industry in the national share remains high.

Organic bulbs could be the solution for the environmental problems in the bulb-growing industry. However, due to a more labour-intensive production method, the yield of organic bulbs is about 20% less, while prices are 40% higher than regular bulbs. Therefore, the market prospect of growing organic bulbs in the Netherlands does not seem to be very positive. Although, the Netherlands has a comparative advantage in producing and exporting regular bulbs, it would have difficulties with exporting organic bulbs to, for example, France. First, there is no actual demand for organic bulbs, eventhough the interest of consumers in organic products is high. It turned out that consumers have no idea of the meaning of organic bulbs. Second, the bulb is sometimes smaller and more expensive than a regular one, while consumers prefer big flowers. Third, the environmental benefit is not for France but for the Netherlands. Why should a French consumer pay a higher price for a bulb to save the Dutch environment? Finally, consumers cannot see or imagine the benefit of the purchase.

One could infer that the demand for organic bulbs could only be created and stimulated with the help of national and European legislation, or with strong marketing tools.

Chapter 5 SWOT analysis and recommendations

To promote the export of organic bulbs to France to increase the organic bulb-growing industry in the Netherlands, or to promote the organic bulb-growing industry in the Netherlands to increase export of organic bulbs to France? That is the question.

This chapter forms with the help of an SWOT analysis an insight into the possibilities and barriers of the export of organic bulbs to France. The analysis is based on the results of chapters 2, 3 and 4. It will lead to some suggestions concerning the export of organic bulbs. The chapter starts with a short introduction of the SWOT analysis and ends with some recommendations.

§ 5.1 SWOT analysis

An SWOT analysis is an examination of an organisation's internal strengths and weaknesses, and its environment, opportunities, and threats. It is a general tool designed to be used in the preliminary stages of decision-making and as a precursor to strategic planning in various kinds of applications. (Johnson et al., 1989; Bartol et al., 1991)

Chapter 3 provided opportunities and threats from the environment of organic agriculture in France. They are summarised in table 8, p. 43. The fact that 43% of the French consumers buy organic products out of ethical and ecological reasons (O1 in table 8) and that the demand for organic products in France is well developed (O2, O4, O5) can both be considered as opportunities. However, the threat is the relatively high price difference between organic and regular bulbs compared to the ‘accepted’ price level between other organic and regular products (T3) and the association of organic products with food (T2). Nevertheless, the French and the EU-government both developed a positive attitude towards organic products (O6, O7). Unfortunately, the EU logo is unknown (T3), but many French supermarkets carry their own logo (O3).

Chapter 4 handled the internal weaknesses and strengths of the regular and organic bulb-growing industry. The main points can also be found in table 8. The bulb-growing industry is innovative and its world market share is high (93%). The organic bulb-growing industry can benefit from these characteristics. In addition, the production process of organic bulbs is less polluting and producers save money on crop protection agents. However, the organic bulb-growing industries face a lot of weaknesses, like some varieties produce small flowers, low yield, high price, labour intensive and small scale production process, no visible benefits for the consumer and a negative outlook for the domestic market.

Table 8, combines the opportunities and threats from the environment with the strengths and weaknesses of the organic bulb-growing industry. This results in four sections. The first represents the question: is this strength remarkable enough to utilise the given opportunities? The second: is this strength remarkable enough to avert the threats? The third, does this weakness prevent the industry to use the opportunities? The fourth, does this weakness prevent the industry to avert the threats? The recommended marketing strategies resulting from these questions are put in a square.

Government policy

In section 4 of table 8 most of the options produced by the SWOT analysis have to do with government policy. Economists, like Ricardo, Krugman or Porter, teach us that initially a strong home market is necessary to develop a comparative advantage in export of goods. In the case of the organic bulb-growing industry, the domestic demand and supply seem to be too small to develop a comparative advantage to compete with regular bulb farmers, as long as the negative external effects of regular bulbs are not internalised in the prices and a decrease in the price difference between organic and regular bulbs is not realised (T3). The government could for example apply the Polluter-Pays-Principle (PPP) or apply a different VAT-regime on organic bulbs and regular bulbs.[3] For example, decrease the VAT-tariff for organic bulbs from 6 to 0% (competence of the EU), or increase the VAT-tariff on regular bulbs from 6 to 19%. The government could also stimulate the domestic demand for organic bulbs by financing a public campaign to promote organic bulbs in the Netherlands as well as in foreign countries. The increase of export possibilities is a strategy to compensate the negative outlook in the domestic market (W3). An increase in the demand for organic bulbs could stimulate farmers to grow organic bulbs and therefore bring about increasing returns to scale (W4) and diminish the price difference (T3). The same result could be realised by an increase in the foreign demand for organic bulbs.

None of these solutions belongs to the field of green marketing discussed in chapter 2, i.e. convincing the consumer that the organic bulb contains a new additional value. Only then, the consumer is ready to pay more for the bulbs. Bowman explained in his book 'The essence of strategic management' that there are two routes to superior performance: be a low cost producer in your industry or use differentiation of your product. Organic bulb producers can differentiate for example by creating new colours, or a new form. The danger is that this could be a short-term strategy, because imitation power of the regular producer is high. One has to find an innovative marketing concept. The SWOT analysis produced some innovative marketing concepts.

[3] The Organisation of Economic Co-operation and Development adopted the PPP in 1992 and the EU in the Single European Act (1987) and the European Maastricht Treaty (1992).

Table 8 Swot analysis

Environment	*Opportunities* O1 43% of the consumers buy organic products for ethical and ecological reasons O2 organic products penetrate French supermarkets O3 supermarkets' own logo O4 French logo very successful O5 demand organic products absolutely high, but in % low O6 French government's positive attitude O7 EU-policy in favour of organic agriculture	*Threats* T1 organic products in general are related with food products and bulbs are non-food T2 EU logo unknown T3 price difference between organic and regular is high compared to price differences between other organic products and their regular counterparts T4 supply organic products in France underdeveloped
Internal *strength* S1 less pollution S2 innovative S3 bulbs comparative advantage in exporting S4 savings on crop protection agents	SO1 communicate the environmental benefits SO2 co-operation with one of the three big chains of garden centres, for example Truffaut or one of the shops, Stade (S3) SO3 acquire a supermarket or garden centre logo (S2) S1O4 an own logo closely linked with AB (Agriculture biologique, Bulbe biologique) **1**	ST1 Associate organic bulbs with the successful organic fertilisers ST2 Mutual recognition of the SKALL-logo and AB-Logo S1T2 funny label **2**
weakness W1 Low yield, high price W2 small flowers, no direct benefit, external benefit for the exporter W3 Negative outlook domestic market W4 small scale, labour intensive	WO1 create demand for bobo's WO2 a week of the organic bulb in France. Explain the negative characteristics of regular bulbs and the positive benefits of organic bulbs, i.e. no pollution of the soil. WO2 Packaging, information tag attached to the organic bulbs **3**	WT1 egg box (T3) WT3 public campaign financed by the government to promote organic bulb (W1) WT3 the PPP (W1) WT3 apply the zero VAT-regime to organic bulbs or the 19% VAT-regime to regular bulbs (W1) WT3 increase the export possibilities **4**

Marketing concepts

1. The egg box.

With reference to W2, S1 and O1, the packaging of organic bulbs has to fulfil conditions of:

a. No plastic (the consumer will not understand why it is organic if there is some plastic for the packaging);

b. Natural and non-polluting inks;

c. Information concerning the production process of organic bulbs and explaining the difference between organic and regular bulb growing.

When prices of 8 to 10 bulbs in one package between organic flower bulbs and traditional bulbs are compared, the price difference is around 10% to 20%. Most of the bulb packages are more or less the same. Information concerning innovative packaging has not been found. Bulbs were often distributed in plastic package with a small paper coloured on the top giving the name of the flower it produces and a nice picture of it after having bloomed.

A marketing strategy based on the assimilation behaviour of the consumer is the development of a new innovative packaging originating from existing packaging products. For instance, it could be quite interesting to try to sell the bulbs in a traditional egg box. This box contains now 6 instead of 8 bulbs as traditional packaging offers. With this technique, the prices of organic bulbs are in line with the prices of organic bulbs. The egg box could be a very good technique to pull consumer's attention to the product, and start to wonder what it is and why it is like that. Thus, the egg box takes handles W1 and T1.

It could also be useful to create in the same way a proper label for bulbs based on original strategic appearance so that consumers get used to it with a high level of acceptance. The label could represent a funny bulb mascot using a bulb shape for the face, in a green background. To make the product serious and interesting at the same time some additional features have to be developed. For example, it would be clever to explain that there are no eggs in the box using a logo, like a non-smoking logo. In three lines the advantages of the product have to be presented.

It is interesting to know that the organic bulb farmer Ekobol Hoogeveen 'de Zuid' in the Netherlands sells its bulbs in biodegradable flowerpots. This way the consumer can plant its bulbs together with the flowerpot in the soil or just throw the flowerpot away on the compost garbage. This package fulfils the conditions A and B but not C. The information tag contains only the variety and tips on how to grow the bulb.

2. Association with organic fertilisers

The strength of lower pollution could be used to overcome the association of organic products with food if organic bulbs are associated with organic fertilisers. Fertilisers could be appeal products to stimulating the purchase of organic bulbs. Organic fertilisers belong to an active market in France. The potential of every product will be multiplied tenfold if these products are used together. If organic

bulbs were associated with organic fertilisers, consumers would like to try to test organic bulb. An information point in the shop could explain the difference in polluting between regular bulbs and organic bulbs.

3. Logo and name

The strength of lower pollution could also be used to free ride on the success of the French organic logo. The most known organic label AB, i.e. 'agriculture biologique', means organic agriculture. Bulbe biologique, bulbe bio could be good names for organic bulbs on the French market. The organic bulb must get an existing French label, which will provide the product with an additional value (and will explain the difference of price with a normal bulb to the consumer). A possibility is to get a French organic supermarket or garden centre logo.

Business transparency will become increasingly important as green production and consumption evolve. Companies are likely, due to either regulation or voluntary action, to provide their customers with increasing information about their product's environmental impact, so that consumers will be able to decide for themselves if a product suits their needs. Wellman (US) is already experimenting with this notion: an information tag attached to Wellman's recycled polyester fabric offers life cycle assessment (LCA) findings. Therefore, it could be wise to keep in mind that labels' perception is changing in the industry.

4. Bourgeois bohême

For the politically or ideologically motivated consumers, the relatively high price would not be an obstacle to buy organic bulbs. To reach them, it is necessary to communicate the environmental benefits (SO1). However, to create additional demand, one has to find a marketing way without a prohibitive price that gives the organic bulbs a kind of fashionable atmosphere. The organic bulbs can be a product developed for BO-BO (Bourgeois-Bohême), people with money, who live in major towns (Paris, Lyon, Marseille…) and who would like to be original. Most of the time, fashion movement from BOBO is transmitted to all French people.

5. Co-operation with garden centre

The above mentioned strategies could be supported by the co-operation with a garden centre. There are three big chains of garden centres in France: Truffaut, Gam Vert and Jardiland. Through setting up a deal with one of these chains, producer can find a way to distribute the product with a special attraction. The producer can benefit from the infrastructure of the chain: website, magazine, and sellers. Truffaut was asked if they were interested in co-operation. Their answer was not precise. They had a negative experience with the marketing of organic seeds. In this case, it might be an idea to contact the shop of Stade de France and try to plan something with them.

For example, one could launch a week of the organic bulb by showing the beneficial properties of these bulbs. Garden centres organise at the beginning of the spring a special part of the shop with only organic products (see picture). It would be necessary to advance the main bulb's quality, which is the non-use of fertiliser and other pesticides to produce them. It is necessary to make the consumers aware that organic products are not only for foodstuffs and that regular bulbs contaminate the soil. Consumers do not see the advantages for soils because they believe that flowers cannot pollute quite as much as for example cars or some industries. The main point of the deal with the garden centre is to share these costs among every actor and limit the increase of the price.

§ 5.2 Recommendations

Market prospects of growing organic bulb in the Netherlands seem to be not very positive. The yield of organic bulbs is about 20% less, while the price is 40% higher compared to regular bulbs. The environmentally friendly production method is the main reason for the price difference between regular and organic bulbs. Another reason is that the organic industry is too small to bring about economies of scale. The demand for organic bulbs could only be created and stimulated with the help of national and European legislation or with strong marketing tools.

Government policy

When markets fail to incorporate environmental effects, the government has to take care of the situation, in which the bulb farmers face the appropriate signals. Despite all kind of regulations, the large-scale bulb farmers still admit to a high use of crop protection agents, and the contribution of crop protection agents of the bulb-growing industry in the national share remains high. This way the regular bulb industry passes on the negative external effects to society. To stop this process, the Dutch government could for example apply the PPP in the bulb-growing industry and apply for example for the high VAT-tariff of 19% on the polluting bulbs or lobby within the EU for a zero VAT-tariff on organic bulbs. The government could also stimulate the domestic demand for organic bulbs by financing a public campaign to promote organic bulbs in the Netherlands, as well as in foreign countries.

Marketing tools

Market expectations could change if for example the export possibilities of organic bulbs would increase drastically. In France, for example, the general feeling dominates that the growing demand for organic products combined with the French government action plan will boost organic food sales. Moreover, European policy, and thus the rules, which the producers have to apply, have turned to the concept of quality and aim at producing of qualitative products. This positive development can be considered as a good opportunity to introduce organic bulbs on the French market.

However, French consumers are still not ready for the organic non-foodstuffs and there is no actual market for organic bulbs. Some time will be needed to reach a point where the demand realises economies of scale. Nevertheless, with the tools of green marketing some attempts can be worthwhile.

To be successful, green marketing involves the establishment of credibility, a focus on direct benefits, a combination of green products with other positive characteristics and the potential to eco-innovate. Above all, green marketing needs to provide information, as well as to appeal to emotions. Consumers set aside their prejudice that green products cost more (or have an inferior quality, or both), as soon as they experience other benefits of the green products apart from their environmental soundness. Due to a general claiming for the environment and a call for transparency, many new innovative products

answering to ‘green ´ criteria were launched. Most of them could not get through, but some of them succeeded with an unexpected success. Thus, it does not seem so strange to pay attention to organic flower bulbs.

We think that co-operation with Truffaut could be a good way of testing a French customer. We recommend trying the name ‘biobulbe’ and finding out how it really sounds to French people. In co-operation with Truffaut, innovative marketing ideas like the egg box and the organic fertilisers as a stimulus for buying the ‘green´ bulbs could also be tested.

If we consider the future, ecological product would foist upon markets because ecology is the future; the overexploitation of soil will conduct governments to take preventive measures to assure a feasible future for next generations. After the mass production, it is time to develop qualitative product with a long friendly environmental perspective.

If today consumers are not yet ready for this kind of non-foodstuff product, they will be in the future, and biobulbs should interest the consumer and should become the main kind of bulbs on the market.

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