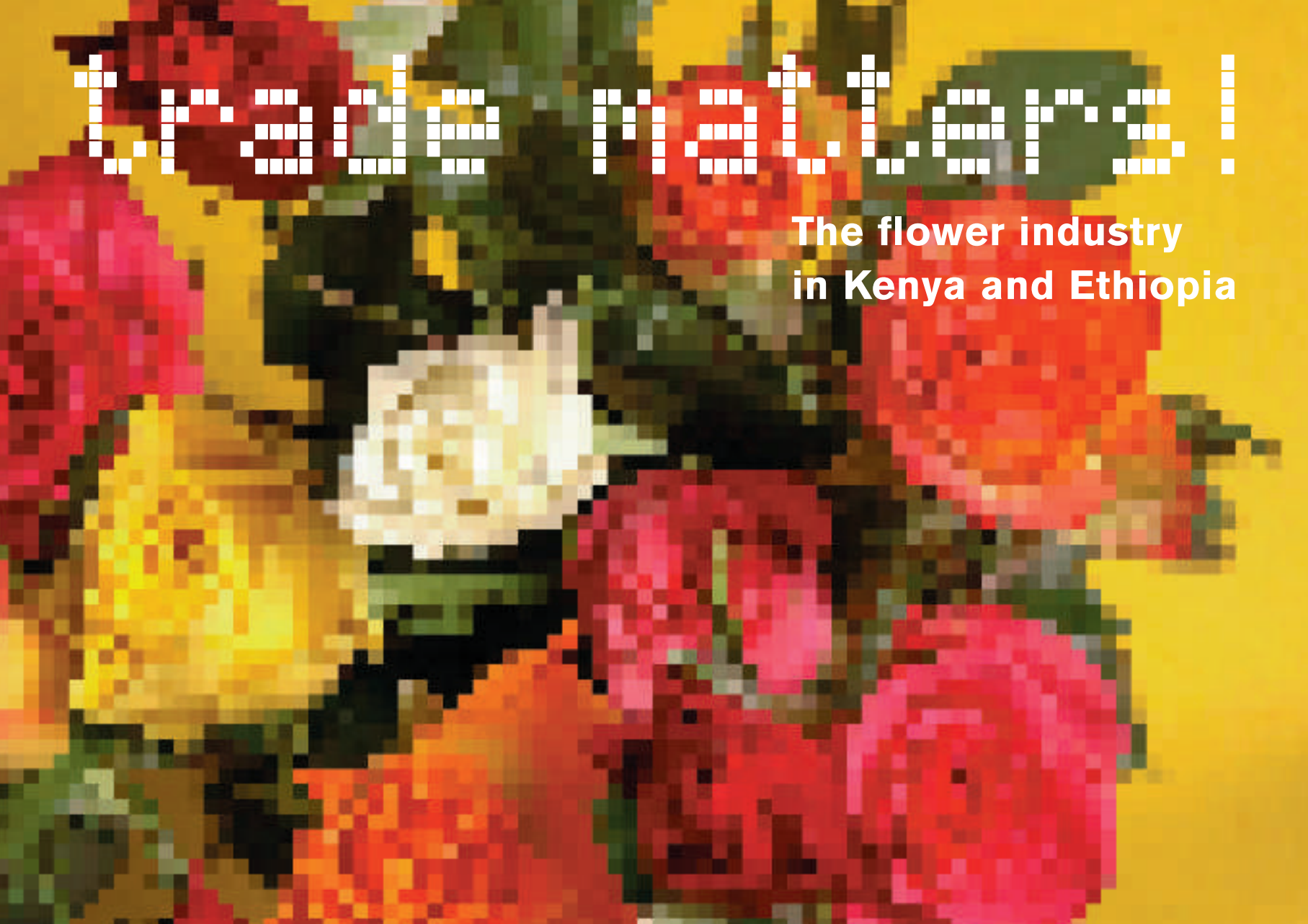


Trade notes!

The flower industry
in Kenya and Ethiopia





TRADE MATTERS!

The flower industry in Kenya and Ethiopia

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Introduction



Trade Matters!

Trade and foreign direct investment are important instruments in the fight against poverty and ecological degradation. It is an undisputed fact that trade and investment flows can play a positive role in reducing poverty and in halting biodiversity-loss. What is disputed, however, is how these flows should be regulated and organised. Finding ways to maximise the positive contribution of trade and investment flows for sustainable development is certainly one of the greatest challenges of this decade.

The following case study is part of a series produced by IUCN-National Committee of the Netherlands (IUCN NL) and Both ENDS to provide more insight into the relationships that exist between economic policy (such as trade and investment policies), the achievement of sustainable livelihoods in poor countries, and halting the loss of biodiversity. Each case

describes a specific example, and offers recommendations on how to move forward. The cases are intended to support the current discussions worldwide on how globalisation can benefit all life on earth.

The flower industry: global production and trade; the Netherlands, Kenya and Ethiopia

"An environmental impact assessment helps the flower producer to choose the safe technologies. Regular environmental auditing after starting to grow the flowers enables the flower producer to keep humans and the environment safe and also his pocket filling, free from the risk of being emptied by the impacts of pollution."

Tewolde Berhan Gebre Egziabher, Director General, FDRE Environmental Protection Authority - Ethiopia

This case study focuses on the socio-economic and ecological impact of flower production and trade in two East African countries, Kenya and Ethiopia, and relates this to international trade agreements designed to liberalise the market and specifically addresses the role of Dutch foreign direct investments facilitated by Dutch government support programmes.

On a global scale, the flower industry is booming: world consumption of flowers is growing at a rate of 6 to 9% a year with highest growth rates in Japan and the USA. It is estimated that the European Union consumes 50 percent of the world's traded flowers. In 2004, consumers in the EU spent over €12.000 million on cut flowers and foliage. Some of the EU markets show some saturation, while flower consumption in other EU countries is still growing. Within the EU, Germany is the biggest consumer, followed by the UK, France and Italy in order of importance.¹

The global production pattern of cut flowers is currently undergoing important changes. Next to the traditional centres of production (The Netherlands, Japan, Italy, and the USA,), new production centres are steadily becoming important. In Africa and Latin America, the industry is growing very quickly. However, after many years of

an undersupplied market, world cut flower supply, especially for the most common varieties, has now expanded to match or exceed what has been relatively slow growth in demand during the past few years. Especially, the price decline for roses has been more pronounced than for any other major type of flowers. In fact, prices for several relatively minor flower varieties have increased in recent years.²

¹CBI, 2005.

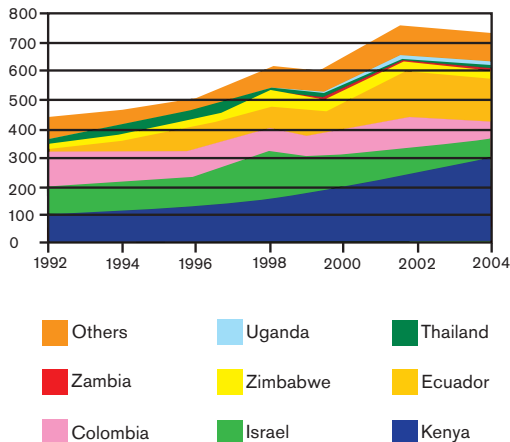
²CBI, 2005.

³CBI, 2005

⁴Union Fleurs, 2005.

⁵Yearbook of the international horticultural statistics, 2005

Trade from non-EU to EU countries, 1992-2004 (in million Euro)



The increased competition for certain types of flowers will have effects on the economic sustainability of each production centre.

International trade in cut flowers is largely organised along South-North lines. Asia-Pacific countries like Thailand, China, Malaysia and New Zealand are the main suppliers to Japan and Hong-Kong. African countries like Kenya, Ethiopia, Zambia and Zimbabwe export to Europe. Central and South American countries like Colombia, Costa Rica and Ecuador supply the United States.

The Netherlands being the world's leader producer and the flower distribution hub is a mayor supplier to all flower consuming areas. The Netherlands constitutes the major market for developing countries because of its massive trading role in distributing imported flowers throughout Europe.³ The main countries involved in this trade through the Netherlands are Kenya (37,7% share in 2004), Israel (15%), Zimbabwe (11,39%) and Ecuador (7,8%).⁴ Colombia is also a significant exporter of flowers to Europe.⁵ Thus the Netherlands plays a pivotal role in the global flower trade and its auctions are of importance as they play a crucial role in international standard setting.

1 The Policy environment: Regulations and barriers



It is not easy for developing countries to trade with Europe. In many sectors there are still tariff and non-tariff barriers that impede the free flow of goods. Non-tariff barriers include quality standards, packaging requirements and measures related to production processes. In addition to these barriers, the European economy, particularly the agricultural sector, receives a great deal of official support through subsidy schemes, fiscal measures and export guarantee schemes.

Sanitary and Phyto-Sanitary requirements (SPS), which regulate the basic rules for food safety and animal and plant health standards, can be significant barriers to trade. These are set out in The Agreement on the Application of Sanitary and Phyto-Sanitary measures (SPS), one of the agreements made within the World Trade Organisation (WTO). This agreement specifies that import requirements must comply with international standards and should not be used as an unnecessary barrier to international trade.

Nonetheless for most developing countries, and specifically smallholders in developing countries, SPS standards form the most significant barrier to trade.⁶

Dutch SPS requirements are largely formulated in accordance with the WTO SPS agreement. Despite this, a 2003 study found that the Kenyan flower industry suffers from these standards. Smallholders find it especially difficult to meet these requirements, as they lack the financial resources for the necessary investments to comply with the standards.⁷

The SPS agreement allows for exemptions to these trade rules, to take into account the particularities and specific conditions faced by individual countries (article 6, WTO SPS agreement). From a development perspective, it is interesting to explore this exemption to differ from the norm. For example, the SPS requirements for a specific pest that is only found in cooler climates, should not be a requirement for a product that originates from warmer climates where this pest is not prevalent. From an ecological perspective, exemptions on the prohibition on the use of specific pesticides and chemicals might not be desirable.

Arguing for special conditions does, however, require scientific justification, which is a prohibitively expensive exercise.⁸ Investing in pest and disease control measures that comply with European standards could reduce and minimise the impact on the natural ecosystem and human health, and is probably a more advisable route.

Dutch government support

The Dutch government has different programmes to support private corporations to do business abroad. Such support may be provided in the form of subsidies, credit guarantees or insurances, especially for business in developing countries and emerging markets.

Information on such government supported transactions and their impact on sustainable development is difficult to obtain as there is a relative lack of transparency in this area. Moreover, local stakeholders are rarely consulted prior to transactions being made. In this setting, it is hard to obtain a clear understanding of the impacts of government supported business transactions on the environment and local livelihoods.

Reform of government support programmes proves to be a difficult task. The implementing agencies operate in a highly competitive environment, and argue that information given prior to a decision to support an enterprise will harm its own competitive position and that of the applicant. The application of sustainable development principles is generally seen as to unnecessarily adding to the administrative burden and costs of doing business.⁹

With a focus on reducing financial risks, government support programmes for international business transactions have evolved into institutions with a weak record regarding sustainable development. Yet as the largest source of public financial support for corporate involvement in commercial projects abroad, such programmes have major impacts on the sustainability of development processes.

⁶Henson, 2000.

⁷De Vos, 2003.

⁸De Vos, 2003.

⁹Wiertsema, 2003.

¹⁰Programme for Cooperation with Emerging Markets

PSOM

PSOM (Programma Samenwerking Opkomende Markten¹⁰) is one financial instrument available to Dutch investors in emerging markets, particularly in developing countries. It is financed from the ODA budget (Official Development Assistance) and managed by Senter/EVD, a public agency that distributes Dutch subsidies. The maximum PSOM subsidy is €1,5 million. Compared to other financial instruments for business abroad, PSOM supports fairly moderate transactions and its impact is rather small. PSOM has an explicit objective of stimulating sustainable economic development in emerging markets. The applying business proposals must be commercially feasible in medium or long-term and have a positive effect on the local economy of the recipient country in terms of creating additional employment, introducing new technology, improving livelihoods, strengthening small and medium sized businesses and/or resulting in improved environmental conditions.

The programme involves pilot investments from Dutch companies that set up new business ventures together with local companies in eligible countries (see box). The projects are expected to contribute to poverty alleviation (www.evd.nl).

PSOM Criteria

- You are a Dutch company and a company in the PSOM country with an aim at setting up a new activity in partnership with each other in one of the PSOM countries
- You and your local partner are financially sound, have relevant expertise and experience in the market and enter into a long term trade or investment relation
- The applicant should be a company registered in the commercial register at the Chamber of Commerce in the Netherlands. The recipient should be a private company, officially registered in the recipient country. There is no limitation in the percentage of shares of the recipient company, which are owned by Dutch companies.
- You do not have the financial means to implement your plans nor can you obtain funds from a bank to finance your business plan.
- Your proposal is commercially feasible in medium or long term and has a positive effect on the local economy of the recipient country in terms of creating additional employment, introducing new technology, improving livelihoods, strengthening small and medium sized businesses and/or resulting in improved environmental conditions.
- Your project leads to additional investments and increase in turnover.
- You are both capable to finance your own contribution.

PSOM countries

Africa: Benin, Mozambique, Burkina Faso, Rwanda, Cape Verde, Senegal, Egypt, South Africa, Ethiopia, Tanzania, Ghana, Uganda, Kenya, Zambia, Mali
Asia: Afghanistan, Palestinian Authority, Bangladesh, Philippines, China, Sri Lanka, India, Thailand, Indonesia, Vietnam, Mongolia, Yemen, Pakistan
Latin America: Bolivia, Nicaragua, Colombia, Peru, Guatemala, Suriname,
Central and Eastern Europe: Albania, Macedonia, Armenia, Moldova, Bosnia-Herzegovina, Romania, Bulgaria, Russian Federation, Croatia, Serbia and Montenegro, Georgia, Turkey, Kazakhstan, Ukraine

Source: www.evd.nl

Dutch government support for business abroad

For a small country like The Netherlands, foreign investments and international trade play a very important role in its economic survival. Especially in the last 15 years, foreign direct investment and international trade have grown substantially. Annually the Dutch government supports business transactions abroad by domestic corporations with at least € 280 million in subsidies, and insurance cover for export and investment transactions worth more than € 2.000 million.

The business support of the Dutch government is provided via different agencies. Atradius Dutch State Business (DSB) is in charge of insurance instruments. Senter/EVD and the Dutch Development Bank FMO provide subsidies and grants. Since there are quite a number of different policy instruments and agencies involved, it is not very clear who manages the work of these different institutions and who makes sure that important development standards, transparent procedures or debt problems of host countries are taken into account.

It is difficult to get specific information on government supported transactions and their impacts on sustainable development:

- It is unclear which government ministry is responsible for which policy instrument, while the implementation thereof is outsourced to different private agencies;
- None of the different facilities has a transparent communication policy and ex-ante information for local stakeholders is not available;
- The implementation of Corporate Social Responsibility criteria is recommended but not well enforced;
- There are few evaluations on the development impacts of the different facilities.

Source: Wiertsema (2003)



Ethiopia has been eligible for PSOM since 2003. Since that time the interest of the Dutch private sector, including from the flower industry, has grown. Dutch flower growers and traders have had an interest in Kenya's flower industry since the 1980s. When the country became eligible for PSOM projects in 2004 this interest increased. The flower industries in these two countries are now the focus of much PSOM-supported Dutch private sector investment. In 2005, three projects in Kenya were supported by PSOM, to a total value of €1,925 million. The projects that were sponsored ranged from supporting a flower farm that produces consumer ready flower-bouquets to setting up hi-tech facilities for environmentally friendly flower production. Three projects in

2 The socio-economic impact of the flower industry

Ethiopia were also supported to a total amount of €1,548 million. These projects are also aimed at setting up modern flower farms, as well as seed production, and a coldstore facility for keeping the flowers fresh.

Although PSOM includes several Corporate Social Responsibility criteria based on the OECD guidelines for transnational corporations,¹¹ and includes social, environmental and anti-corruption criteria, assessments of PSOM applications are carried out by the EVD without any consultation of local stakeholders. Moreover, it is not clear how the impacts of PSOM supported transactions on livelihoods, environment and society of a PSOM project are monitored and evaluated during and after the processes of implementation.

¹¹www.oesorichtlijnen.nl



Statistics of the Dutch, Kenyan and Ethiopian industry*

General Statistics	The Netherlands	Kenya	Ethiopia
Population size	16.321.789	31.600.000	66.500.000
Area	41.526 km ² (18,41% water)	582.650 km ² (2,3% water)	1.127.127 km ² (0,7% water)
Economic growth (% per year)	1,3	1,8	-3,8
GDP per head (USD)	38.320	414	94
Unemployment rate (%)	6,6	50	NA
Total imports (USD)	252,7 billion f.o.b. (2004 est.)	3,9 billion 4,19 billion f.o.b. (2004 est.)	2 billion 2,104 billion f.o.b. (2004 est.)
Total exports (USD)	293,1 billion f.o.b. (2004 est.)	2,4 billion 2,589 billion f.o.b. (2004 est.)	0,5 billion 562,8 million f.o.b. (2004 est.)
Share agriculture in GDP (%)	2,3	24	44
Employment in agriculture (%)	3,5	80	85



Facts about the Kenyan and Ethiopian flower industry**

General Statistics	The Netherlands	Kenya	Ethiopia
Exports of flowers	€ 2.293.819.000 \$ 3.112.483.001 (2004)	KSh. 19 billion \$236 million (2005) Flowers account for 8% of Kenya's total export earning	\$ 20million (2005) ^{1,2}
Share export horticultural products	-	46	-
Share total exports in value (%)	1,01	8	-
Number of people employed	42.000 direct	70.000 people directly and another 500.000 people indirectly	-
Surface flower production	5.478 ha	2.180 ha	-
Number growers	6.853	140	-
Exports in tons	20.762	41.400	-

*Sources: CBS (The Netherlands), EVD (The Netherlands), www.wikipedia.org, www.cia.gov/cia/publications/factbook/

**Sources: Inventory of the flower industry in Kenya, Steve Ouma (2005), CBI, EVD, CBS and KFC (www.kenyaflowers.co.ke/industry-info/flori.php)

Facts about the Kenyan flower industry

Kenya is the longest established and largest African exporter of cut flowers and is the fourth largest exporter in the world.¹³ Cut flowers account for 46% of Kenyan horticultural exports. After tea and tourism, flowers are the most important source of foreign income; with an export value of US\$ 236 million they account for 8% of all exports. Cut flowers are not only an important source of foreign income. The industry directly employs 70.000 people and indirectly another 500.000, which is very important for a country like Kenya with an unemployment rate of almost 50%.¹⁴

Kenya has a long history in the production and export of cut flowers and as such, it has built up experience with the principles of "Good Agricultural Practice".¹⁵ Kenyan producers have become familiar with the conditionalities that the European Union sets for imported products and with the quality-demands of European supermarkets and retailers, such as those formulated by EurepGAP. Kenya's other strengths include its relatively well-developed infrastructure (roads, cold store facilities and a busy international airport), a production volume that allows for efficient logistics, cheap land and labour and a

favourable climate for flower production. Moreover, the Kenyan government supports the cut flower industry through its favourable policies and a range of incentive-schemes.¹⁶

The Kenyan cut flowers industry also faces some more general structural problems, such as corruption, the struggle for access to water and the HIV/AIDS crisis. In addition, the industry still finds that the requirements set forth in EU policies, like the Sanitary and Phytosanitary standards, the instability or insecurity in the EU import tariff schemes pose many challenges. The same can be said about the blooming forest of certification programmes and codes of conduct required by the market. With a likely increase in competitive pressures (from African countries such as Ethiopia, but also China) in the future, improving entrepreneurship, knowledge and infrastructure are aspects that will require attention of the Kenyan flower industry.¹⁷

Facts about the Ethiopian flower industry

The cut flower industry in Ethiopia still is in its infancy and reliable data about the sector is difficult to find. Coffee is presently Ethiopia's major source of foreign income, but since world prices for coffee are decreasing, the country is looking for

ways to diversify its agricultural exports. Flower production is regarded as one of the most promising sectors with an export potential.¹⁸ Because of the higher altitudes and the stable hours of sunlight, climatic conditions in Ethiopia are even more favourable than in Kenya. This in combination with the availability of land, low labour costs, a favourable investment climate and a relatively shorter distance to the European market (compared to Kenya) make Ethiopia a strong competitor. But, as the Ethiopian cut flower industry is still in its infancy, there are still important barriers to be overcome. For the export of cut flowers, an efficient handling and distribution centre, and adequate potential to handle airfreight are all crucial and still underdeveloped. Furthermore, education, training and research in the field of floriculture are needed as is the development of locally suitable varieties and cultivars.¹⁹

¹²http://www.ethiopianembassy.org/news021606_3.shtml

¹³Ouma, 2005.

¹⁴Ouma, 2005.

¹⁵LEI, 2003.

¹⁶LEI, 2003 and Ouma, 2005.

¹⁷LEI, 2003.

¹⁸EVD, 2005.

¹⁹Bech, 2004.

Labour conditions

Extensive research on labour conditions in the Kenyan flower industry (mostly in “progressive” enterprises) has shown that there have been recent improvements in labour conditions but that further improvements are still needed, particularly for women who comprise 75% of the labour force.²⁰ Other conclusions include:

- Job insecurity still is a major concern of Kenyan workers, even though casual and temporary workers are legally required to be given permanent status after eight months employment. Research findings showed that while employers have begun to issue more permanent contracts for seasonal and casual workers, 33% of the sampled workforce remained in insecure jobs.
- Payment and working hours still need to be improved; as wages still fall short of a living-wage level, even though they exceed the government minimum wage. Overtime was found to be often compulsory. Employees frequently work longer than allowed in codes and national law and are not compensated properly for this.
- Chemical exposure remains an important concern to workers.

- Even though there has been an increase in union membership over the past years, membership is still low and excludes temporary and seasonal workers.
- Women still face sexual harassment, discrimination and occupational segregation.

No equivalent studies have yet been done in Ethiopia.

Smallholders

It is not sufficient to discuss the contribution of the flower industry in Ethiopia and Kenya solely in aggregate figures. It is important to disaggregate the effects and differentiate between those social groups that have benefited from the cut flower trade and production and those groups that are excluded or have been disadvantaged by it. This allows us to see the real effects of flower industry in reducing poverty.

Research on horticultural commodity chains, which includes the cut flower chain, shows that they are strongly buyer-driven and operate at a global level. Retailers and supermarkets have substantial power and determine which types of producers and processors are able to gain access to the chains and the activities they must carry out in order to get access. They set requirements with regard to cost,

quality, delivery, product standardisation, innovation, and quality systems. These requirements may act as an active barrier to participation in the commodity chain by small exporters and producers.²¹

In the Kenyan flower industry, the 25 biggest flower companies are responsible for about 75% of all exports. These figures have not been collected in Ethiopia, but some claim that the contribution of the flower trade to poverty alleviation is limited to the employment of workers and some other indirect spin-off effects.²² The industry has limited effects on poverty reduction. Smallholders are not able to raise the investments needed to participate in the global market.

There are a number of major trends in the Kenyan flower industry: the rising value of exports, increased post-harvest processing within Kenya, and a shift from smallholder production. Overall these are likely to enhance the poverty reducing impact of the industry, with the positive impact of continued export growth and increased post-harvested processing likely to more than offset any likely reduction in employment resulting from the shift away from smallholder production. While changing production patterns may lead to increases in monetary incomes there are also non-

monetary related impacts to take into account. These relate to working conditions, such as long working days, lack of security of income and lack of freedom to pursue other activities during free time, which may all adversely affect individual welfare.²³

Access to natural resources

Flower production requires space for the greenhouses, packinghouses and auxiliary buildings and the development of the industry impacts on land use and tenure. In both Kenya and Ethiopia, floricultural investments are located on leased or rented land. In Ethiopia, in theory all land belongs to the state. To facilitate floricultural investments the Ethiopian government has expropriated land from small farmers and leased it to investors for periods of 30 years.²⁴ Farmers are compensated for their land with a cash sum equivalent to five times the value of their previous annual harvest.

Flower production can also create other social conflicts. In the Laikipia district in Kenya for example, there have been many confrontations over land so far between the Massai, a Nomadic East African tribe, and non-native flower growers (originating from other Kenyan regions, descendants from European colonists or 'new' foreign producers).

Competing demands on water also give rise to social conflict. Flower production is as many other agricultural practices, a water thirsty sector and it competes with other water uses, including other agricultural activities, domestic water supply and ecosystem requirements. Especially in a country as Ethiopia that has experienced the last 20 years recurring droughts followed by food shortages and famines, this is an important issue to take into account. In Kenya, the growth of the cut flower industry in certain areas has created tensions between local communities and investors.²⁵ Lake Naivasha is one area where the growth of the flower industry is thought to have increased pressure on water resources and the number of conflicts between various water users, land users and other stakeholders has been steadily increasing.²⁶ Fisher people, cattle breeders, flower growers, tour operators and the growing municipalities (because the flower industry is attracting many people from all over the country who are hoping to find a job in the industry) are increasingly competing for access to the lake and water.²⁷

Food security

Related to these two issues, is the question of the effect of flower production on food security. With a shift in land use away from the production of food, it becomes more difficult for people to secure an adequate food supply, especially for those who have been displaced from their land or who experience declines in water availability. In Ethiopia 85% of the people live in rural areas and depend on a traditional mixed subsistence farming system. A large part of the population lives in poverty and an intermittent if not permanent state of food insecurity.²⁸ Turning over lands from food to flower production is unlikely to have a positive effect on this situation. In effect, flower production might even push food production to remote or marginalised lands.

²⁰Dolan et al, 2002.

²¹Humphrey et al, 2004.

²²Bech, 2004.

²³Humphrey et al, 2004.

²⁴Bech, 2004.

²⁵Ouma, 2005.

²⁶Bech, 2004. Page 2.

²⁷<http://news.bbc.co.uk/2/hi/africa/3241049.stm>
<http://www.netwas.org/news/letter/articles/2005/01/7>

²⁸Bech, 2004.

3 The environmental impact of the flower industry



Pesticides and Lake Naivasha

“Water, sediment, red swamp crayfish and largemouth bass were collected from five sampling stations around the lake. All the organic chlorine residues being investigated were detected in both black bass and crayfish. This was an indication that farm pesticides such as dieldrin, aldrin, lindane and endosulfane were in use in the lake’s water catchments. The report said it was deduced that the residues existed in the system at low concentrations and manifested in living tissue mostly because of the chemicals affinity to fat.”

Source: the Nation, 2005

Water extraction

One major concern for different stakeholders within the flower industry is the impact of the flower industry on the hydrology of regions where it operates, as its demands for water are high and it places pressure on water resources, especially where water resources are scarce.

The Lake Naivasha region in Kenya is one area where flower production is thought to be leading to serious pressure on the ecosystem and social conflicts. Since the first flower farm was established near Lake Naivasha in the 1980s, the area has experienced a floricultural boom and has attracted many people to the lake, which has put additional stress on the lake’s water resources. The level of the lake is currently falling and some have blamed the flower industry, although the precise impact of water extraction for flower growing has not yet been proven. The hydrological functioning of the lake is still poorly understood because of the complex hydrology and geology of the Rift

Valley. Historical information shows that water levels have varied greatly over the last century, by more than 12 metres. In the 1880s the lake was almost dry and between 1930s and 1950s, the water levels were so low that no water extraction permits were issued. This was long before any flowers were produced in the area (in the early 1980s, a vegetable grower decided to switch to flower production and became the first commercial flower grower in Kenya). In the Naivasha catchment, the area under irrigation is 4.800 ha of which 800 ha is under flowers and 4.000 ha under dairy and vegetables. In total, there is an irrigation demand of 39 million m³, which is granted by the District Water Resource Department, while the safe yield (in order to maintain all the functions of the lake) is estimated at 16.5 million m³ per year. Flowers consume 8 million m³ water through very efficient drip irrigation systems and dairy and vegetables use 31 m³ through open-air sprinklers. Although flowers take more water per hectare than the vegetable and dairy production, the profit of flower production is much higher than the vegetable and/or dairy profits. Therefore strategic planning towards water is a very important issue.²⁹

In Ethiopia, the impact of irrigated agriculture on the hydrology of important

water resources needs to be taken seriously. An arid country like Ethiopia needs to make strategic decisions on water use and management. Research shows a dangerous trend in the Awash basin, where almost half of its natural capacity is being extracted for open-air irrigation schemes resulting in low efficiency due to evaporation. All the existing irrigated agriculture and horticulture schemes in the area (covering some 70.000 ha) have ambitious plans for expansion, to up to 150.000 ha. Together with the flower industry ambitions, this is likely to cause serious problems in the future if no strategic decisions are being made.³⁰

Chemicals

One of the characteristics of the flower industry is its use of agrochemicals, which can be dangerous to human health and the environment. Around Lake Naivasha in Kenya, there are serious concerns about the impact of chemical use on the water quality of the Lake, especially since Lake Naivasha was designated as a Ramsar site in 1995. Environmentalists and fisherfolk fear that the chemicals washed into the lake end up in the food chain. Yet there are very few available analyses on pesticides in the lake water. According to research, the large flower farms and the many smallholders in the upper catchment

clearly have an effect on the lake's water quality. Nevertheless, the trophic status of the lake is still acceptable.³¹

The impact of chemicals on water quality is one concern; other concerns include their impact on the broader environment; on human beings, animals and the soil. According to other research,³² codes of conduct have brought considerable improvements in occupational health and safety particularly with respect to the safe use of chemicals and the provision of protective clothing, toilets, washing facilities and drinking water. However, serious problems persist, with workers complaining about health problems related to pesticide use (coughs, sore chests, skin irritation and dizziness). According to workers, these problems are due to working with freshly sprayed plants, working unprotected in the greenhouse while chemicals were sprayed or entering greenhouses before re-entry times have expired.

Sustainable production

Since the 1990s, there have been serious concerns voiced about the labour and environmental conditions at flower farms throughout the world. In order to work on better labour and environmental conditions in the flower industry, trade unions, social and environmental organisa-

Women and exposure to harmful chemicals

While management in all companies said that women did not work with chemicals (usually in accordance with a code of practice), some workers claimed that women were exposed to them on a regular basis. According to one group of flower workers in Zambia, 'Women are also present when spraying is being done. Some of them have children who are sucking and when they go home, they just start breast-feeding their children. We don't have a place for washing our clothing or bodies after work'.

Source: Smith et al (2004)

The International Code of Conduct for the production of cut flowers (ICC)

The main objective is to promote more sustainable production of cut flowers worldwide. Minimal conditions for sustainable production of cut flowers are defined in this code:

- 1 Freedom of association and collective bargaining
- 2 Equality of treatment
- 3 Living wages
- 4 Working hours
- 5 Health and safety
- 6 Pesticides and chemicals
- 7 Security of employment
- 8 Protection of the environment
- 9 Child labour is not used
- 10 No forced labour

Source: Both ENDS (2005) Information Pack Nr. 18 Sustainable production of cut flowers

²⁹Bech, 2004.

³¹Odada et al.

³⁰Bech, 2004.

³²Smith et al, 2004.

tions have started to work together. This has resulted in an International Code of Conduct (ICC) for the production of flowers with standards to which the flower farm should adhere in order to reduce the negative impact of flower production.

Because industry was searching to improve its image and NGOs and trade unions had developed a tool for accepta-

ble flower production, a multi-stakeholder dialogue started on how to make the flower production sustainable.

NGOs, trade unions and industry gathered around the table and discussed the problems in the flower industry and the possibilities to integrate the ICC in flower farms. The ICC has been accepted by the international industry united in Union

Fleurs. In several countries, multi-stakeholder dialogues have emerged and have fed the discussion on sustainable flower production. Moreover Fair Flowers Fair Plants, a label for consumers, is created and is based on this code and is supported by NGOs, trade unions, producers and traders organisations throughout the world.

Recommendations and conclusion

In both Kenya and Ethiopia, the production and export of cut flowers plays a very important role in the economy; in Kenya, cut flowers account for 8% of all exports. Furthermore, the industry generates much employment, very important in a country with an unemployment rate of almost 50%. In Ethiopia, the cut flower sector provides an attractive alternative to coffee, its main export product. Even though the industry still is in its infancy, the flower industry is regarded as one of the most promising export sectors.³³ The flower industry also generates employment for the poor in rural areas in Ethiopia.

The Dutch government supports Dutch investments in the flower sector in both these countries. One of the main tools through which this is done is PSOM, one of several instruments that the Dutch government uses to support international

trade and investments. Ethiopia has been eligible for support through PSOM since 2003 and Kenya since 2004. Although PSOM has several Corporate Social Responsibility criteria referring to the OECD guidelines for transnational corporations,³⁴ social criteria, environmental criteria and anti-corruption, the assessment of PSOM applications is done by the EVD without consulting local stakeholders. Moreover, it is not clear how the impact on livelihoods, environment and society of a PSOM project is monitored and evaluated during and after the processes of implementation.

This series of documents explores the relationship between economic policy, the achievement of sustainable livelihoods in poor countries, and halting the loss of biodiversity. This case study focuses on the social-economic and environmental impact

of the flower industries in Kenya and Ethiopia, and how these are related this to Dutch policy for supporting direct foreign investments, through instruments like PSOM. While the study is not a critique of PSOM per se, it does show that there are serious social-economic and environmental impacts related to the production of cut flowers and argues that Dutch government support for business should take these into account in their decision-making.

For further reading, please check the following websites:
www.flowercampaign.org
www.fairflowersfairplants.com
www.cbi.nl

Dutch government support
www.evd.nl

Naivasha
www.worldlakes.org
www.ramsar.org
www.lakenaivasha.org

³³EVD, 2005.

³⁴www.oesrichtlijnen.nl

The flower industry can have positive socio-economic impacts with reduced environmental risks. However these do not follow automatically and need to be encouraged through proper business plans that take into account the social and economic impacts.

The Dutch government is strongly involved in supporting investments in the flower industry in East African countries, such as Kenya and Ethiopia as well in other developing countries. Given the Netherlands' role as the major producer and trader in cut flowers within the world this is an entirely legitimate and justified interest. However, Dutch authorities that subscribe to the principles of sustainable development should ensure that their support enables the delicate balance between economic gain, social improvement and environmental protection to be maintained. Therefore, we recommend the following conditions:

- Greater attention should be paid to labour conditions on flower farms supported by the Dutch government. Participation of workers and other stakeholders in decision-making processes should be a condition of granting financial support, in order to improve conditions in the industry. Particular attention needs to be paid to the

position of women since they form the majority of the workforce in this industry and often are subject to discrimination and harassment.

- More explicit attention needs to be paid to the processes through which small-holders are excluded from the cut flower trade and ways in which they can contribute and participate, thereby increasing the potential of the flower industry to alleviate poverty and strengthen livelihoods.
- Explicit attention needs to be paid to the ways in which the growth in flower production is affecting land tenure and access to water and ways to alleviate such problems, where they are found to exist.
- Explicit attention needs to be paid to the environmental and health impacts of cut flower production, particularly with regard to chemical use. Ways to alleviate such problems, where they are found to exist, need to be identified.
- Practical implementation and enforcement of the existing PSOM criteria;
- An Environmental and Social Impact Assessment should be included as a criterion for Dutch governmental support as PSOM;

- As part of this a monitoring and evaluation system that focuses on the actual environmental and social impact of the PSOM projects should be implemented.

Such measures can help avoid the situation where Dutch government support, intended to encourage sustainable economic development in developing countries, actually has the opposite impact.

With its long history in the flower industry, as producer, trader and broker, the Netherlands is well placed to play a pivotal role in stimulating flower industries in developing countries that is economically viable, environmentally sustainable and socially equitable.



The following sources were used for the present report

- Barrientos, S, C. Dolan and A. Tollontire (2001) Gender and Ethical Trade: a Mapping of the Issues in African Horticulture
- Bech N. (2004) Floriculture Development in Ethiopia: Water availability and environmental impacts, DHV Water BV, Amersfoort
- Becht, R., Odada, E.O. and Higgins, S. (2005) Lake Naivasha: experience and lessons learned brief. In: Lake basin management initiative : Experience and lessons learned briefs. Kusatsu : International Lake Environment Committee Foundation (ILEC), 2005. pp. 277-298.
- Both ENDS (2005) Information Pack Nr. 18 Sustainable production of cut flowers
- Both ENDS (2006) Bloemen, weelde met een geurtje
- Both ENDS (2007) Atradius DSB and the Dutch Government
- Both ENDS (2007) Balancing Risk: What Export Credit Agencies can do for sustainable development
- CBI (2004) EU Market Survey 2004: Cut flowers and foliage
- CBI (2005) EU market survey 2005 cut flowers and foliage, November 2005
- Dolan, C., J. Humphrey and C. Harris-Pascal (IDS Working Paper 96); Horticulture Commodity Chains: The Impact of the EU market on the African Fresh Vegetable Industry
- Dolan, C., M. Opondo and S. Smith (2002) Gender, Rights & Participation in the Kenya Cut Flower Industry
- FIAN, FES, IUF (2001) Flowers for Justice: implementing the International Code of Conduct
- Forum for the Environment (2005) Laying the Foundation for Bringing about Corporate Social and Ecological Responsibility in the Floriculture Industry of Ethiopia: Project Proposal
- Humphrey, J., N. McCulloch and M. Ota (2004); The Impact of the European Market Changes on Employment in the Kenyan Horticulture Sector, journal of International Development, vol. 16, 63-80

- Madeley, J. (1999) Trade and the Hungry: how International Trade is causing Hunger
- Odada, E, R. Becht, (?) Lake Naivasha Riparian Association (LNRA), University of Nairobi, ITC Enschede; Experience and Lessons Learned Brief for Lake Naivasha
- Ouma, S. (2005) Inventory of the Flower Industry in Kenya (report written on behalf of Kenya Human Rights Commission, Nairobi)
- Rabobank (2005) World Flower Map
- Sikoyo, G.M. (2004) Southern Agenda on Trade and Environment Phase II Regional Consultation- Eastern/Southern Africa, Background Paper
- Smith, S., D. Auret, S. Barrientos, C. Dolan, K. Kleinbooi, C. Njobvu, M. Opondo and A. Tallontire (2004) Ethical trade in African Horticulture: Gender, Rights and Participation, IDS Working Paper 223
- Union Fleurs (2005) Flowers and Plants
- Vos, R. de (2003); Coherence between Dutch SPS requirements and development policy: a Case Study of the Kenyan Cut Flower Industry
- Wiertsema, W. (2003) Overheidssteun voor buitenlandse handel en investeringen
- Wijnands, J. (2003) Internationalisering van het Nederlandse sierteeltcluster in Oost-Afrika: Bevindingen van een studiereis naar Kenia, Tanzania en Oeganda, aangevuld met desk-research, LEI, Den Haag
- Zachariasse, L.C. (2000) Challenges for the Kenyan-Dutch Flower Business in the Years ahead (Introduction at the seminar at the occasion of the HORTEC, Nairobi, Kenya, March 15. 2000)

Newspapers

- The Independent-UK (27-06-2004) The Battle of the Rift Valley
- The Nation-Nairobi (17-03-2005) Lake Naivasha gives up its Tilapia
- New Vision-Uganda (11-11-2003) Lake Naivasha being polluted by flower farmers and the poor
- The Nation-Nairobi (01-02-2001) Who is Killing Lake Naivasha



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