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• Significant developments in strategies and policies
• Programmes and policies effective in reducing rural poverty
• Empowerment of the poor, including women and indigenous people
• Capacity building of local governments, communities to manage resources effectively
• Mechanisms for equitable resource revenue sharing

Means of implementation (Capacity-building, Education, Finance, Science & Technology)
• Improvements in domestic resource mobilization
• Improvements in access to international capital markets, foreign direct investment
• Strengthening of domestic financial sector; improved access to finance of the poor
• Strengthening agricultural, other research centers, institutions and capabilities

Africa

New Danish Africa Policy

In August 2007 the Danish government presented Denmark’s new Strategy for Africa for the period 2007-2011. The strategy is a result of a thorough analysis and an in-depth public debate of Danish development priorities in Africa. More development assistance is allocated towards Africa and attention is given to key challenges of development in Africa: Youth, employment, Climate changes and gender discrimination.

The Danish government wishes to see African countries participate in globalisation as an equal economic partner and hopes to strengthen the Danish engagement in Africa. Furthermore regional cooperation should be strengthened to facilitate trade and establish security.

Support to agricultural and rural development in Africa

Denmark’s development assistance to Africa is primarily focused on ten “programme countries”. Among these countries, seven receive programme support for agricultural development. A number of other countries in Africa also receive assistance though at a smaller scale.

The support is generally being aligned to national strategies and procedures, and harmonised with other donor support. Funds are allocated for joint funding mechanisms/sector budget support to the extent possible. Implementation of some components/activities is anchored with institutions outside government, explained by the private sector nature of this sector.
As a consequence of the increasing focus on economic development within national policy frameworks and of the ongoing process of sector concentrations in the Danida programme countries (following the development of ‘Joint Assistance Strategies’) it is expected that there will be a greater integration over the coming years between the agriculture sector support and transport and private sector/business sector support.

An example of a country where the Danish support is being transformed is Uganda where a new Danida programme linked with the ‘growth objective’ of the national policy framework is under preparation. The programme will be linking agriculture, rural roads and private sector development together.

In Tanzania the JAS process will lead to the phasing out of Danish support to the agriculture sector at the end of the current phase, i.e. in 2008, with elements of the agricultural sector programme being integrated in the business sector support programme. Finally, a programme linking agriculture and transport development in Benin is being considered.

In West Africa support to Agriculture is provided to Benin and to the three Sahelian countries Burkina Faso, Niger and more recently Mali. In Niger a new programme for agriculture/rural development support is being prepared, including among others support to the regionalization of the national plan for rural development (Strategie de Developpement Rural).

**Support within the area of agricultural research**

Following a new strategy introduced in 2007 the Danish support to international agricultural research (mainly to the CGIAR centres) is now focused on research with relevance to Africa.
Support to natural resources management

Of the ten “Danida programme countries” in Africa, five countries receive Environment Sector Programme Support. In addition, a number of other African countries e.g. Kenya and South Africa, are also targeted for Danida support within environment. In most cases the support includes aspects of natural resources management, and specifically governance of natural resources. The environment sector support is similar to the agricultural sector support being aligned to national strategies and procedures, and harmonised with other donor support.

An example of support to governance of natural resources is the Tanzanian Programme. The Tanzanian National Forest Policy, -Act, and –Programme is supported, in coordination with other donors, specifically with a view to roll-out the new participatory forest management mechanisms involving local people.

The support aims both at sustainable forestry and improved livelihoods, and the monitoring of progress focuses on various governance aspects, such as women participation in forest management groups, sharing of benefits from forestry etc. The support goes not only to the facilitation by the national Department of Forestry, but also to the decentralisation Ministry, and the local authorities. It thus entails governance aspects from top to bottom.

Another example of support to governance of natural resources is the Mozambique coastal zone support. In Mozambique support goes to coastal zone committees, which have been established with participation from the tourist business, as well as local fisheries and farming. Plans for development of the coastal areas were drafted, but the
challenge is to link the plans to the authorised spatial planning in the area, and to provide a powerful alternative to ad hoc individual development initiatives.

Agriculture

Danish agriculture and challenges concerning environment and globalisation

Agriculture, food processing and affiliated sectors are of great significance to the Danish national economy and employment. The food sector is significant particularly in rural areas. These areas are of great importance to the government’s efforts to retain a balanced regional development in Denmark.

Globalisation gives an opportunity to provide products to far larger markets throughout the world. Globalisation also entails a division of labour. The individual work processes will gradually be transferred to where they are carried out most effectively. The food sector is well equipped to cope with the challenges posed by increased globalisation, particularly because this sector has a very high level of knowledge and related skills.

If agriculture and forestry are to be winners in the process of globalisation, it is essential that the framework of primary production are developed continually, so that production can take place in an improving economically, environmentally and socially sustainable manner. In this context it is important to be aware of the fact that the agricultural and forestry industries will be subject to a number of initiatives in the area of nature and environment over the next few years – primarily initiated at EU Community level. This will be of great significance to the conditions in which primary production operates.

The development to date has indicated that Danish agriculture
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has been able to meet a number of stricter environmental requirements while maintaining a high level of output. In some areas such as pesticide use and nutrient pollution, additional efforts need to be considered to secure, that agricultural production will develop in a sustainable way. At the same time, there is a need to both improve the conditions of the agricultural industry by up-to-date regulation of production, and to step up the industry’s investments in physical and human capital. This will ensure that the sector is able to meet the market challenges and requirements for reduced environmental impact. These investments must also include measures that promote technological solutions making it possible for the agricultural industry to be economically and environmentally sustainable at the same time.

In order to meet the challenges mentioned above the Danish government in 2006 initiated a multi-annual plan for sustainable husbandry (“Flerårsplan for bæredygtig husdyrproduktion”). This plan was initiated in a close cooperation between the Ministry of Food, Agriculture and Fisheries and the Ministry of Environment aiming primarily at promoting the use of new technologies in the husbandry sector in order to reduce the production impacts on neighbours, the environment and nature. The plan works in combination with existing Danish regulation targeted towards reducing the impart on environment and nature from production.

With the Danish Action Plan for the Aquatic Environment the nitrogen leaching from agriculture has been halved since the mid eighties. Furthermore the Danish government has introduced The Action Plan on Reduced Pesticide Use aimed at lowering the use of pesticides in the agricultural production.

The Ministry of Food, Agriculture and Fisheries has in 2007
initiated the project “Smag Danmark” (Taste Denmark). The purpose of the project is to encourage and support the production of high quality primary products and a high quality processing chain while securing a large diversity in the market of foodstuffs. These value added products play an important role in ensuring the competitiveness of the Danish food, fisheries and agri business in the future. Among others farmers, firms, public and non public organizations can become part of the project.

National Action Plans for the conservation and sustainable use of plant and animal genetic resources have been set up by the Ministry of Food, Agriculture and Fisheries. The Action Plans have a dual purpose. One aim is to secure the conservation of plant and animal species. A second aim is to create new (added value) agricultural products on the basis of the conserved genetic resources. The purpose is to combine the conservation and utilisation of the genetic resources in an environmental and economical sustainable way.

Denmark has acceded to the FAO Treaty on Plant Genetic Resources and FAO’s Global Plan of Action for Animal Genetic Resources and the Interlaken Declaration on Animal Genetic Resources. The goals of the agreements are mainly implemented through the Danish National Action Plans.

The Danish forestry industry has been under considerable economic pressure for several years, partly due to the enlargement of the EU. Faced with this new situation the industry has searched for alternative sources of income and opportunities that can supplement the income from traditional forestry production (timber sale, Christmas trees and ornamental greenery). Examples include developing concepts within the leisure industry, developing forest-based tourism and developing different sales products for customers.

The Government’s opportunity to reach the Globalisation Strategy goal of Denmark (being among the countries with the
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resources by both genders

The highest number of entrepreneurs by 2015) has been improved with the Danish Ministry of Education’s undertaking of a gender equality assessment. By far the majority of entrepreneurs in Denmark are men. If the number of entrepreneurs is to be increased, it is necessary to get more women involved. The Ministry of Education has therefore integrated a gender perspective in their future work concerning education in entrepreneurship and enterprise. In this way, the gender equality assessment has improved the opportunities for reaching the goals of the Globalisation Strategy.

The Common Agricultural Policy

With the reform of EU’s Common Agricultural Policy (CAP) in 2003 a decision was taken to put greater emphasis on the rural development programme. For instance to strengthen the role of the farmer in rural areas, with regard to both development, nature and the environment. In this way, the CAP and the rural development programme in particular must provide a bigger contribution to meeting the increasing demands of the public for food safety, food quality, a varied supply, animal welfare, environmental quality and the conservation of nature and landscapes.

The reform also transferred most of the EU’s direct agricultural support to decoupled support in the form of the single farm payment scheme, and there are only limited opportunities to continue the payment of coupled support. The aim is to help farmers manage their production to a greater extent in accordance with signals from the market instead of managing production according to what offers the highest support payments.

In addition to receiving support under the single farm payments scheme, the farmer must meet a number of
conditions relating to the use of fertilizers and plant protection products, consideration of the environment, animal welfare and maintaining acreages in good agricultural and environmental condition (cross-compliance). The rural development programme must interact with the single farm payments scheme and the requirement of cross-compliance in this respect.

The single farm payments scheme has been implemented in Denmark with effect from 2005. The support is paid as a fixed area payment and with a supplement to farmers who have been producing beef or milk during a reference period. Area support relating to permanent pasture areas is also being introduced. A very limited proportion of the total support continues to be paid as production premiums, while support is otherwise decoupled, i.e. it is not covered by a production requirement.

Farmers who do not comply with a number of environmental rules and other similar rules risk having their support reduced under the rules of cross-compliance. All rates of aid are reduced over a number of years as a result of mandatory modulation, where funds are transferred from the single farm payments scheme to rural development policy.

Decoupling of support helps to ensure that agricultural production takes place entirely on market terms, which could for instance be expected to result in production on poorer soils becoming more extensive, with reduced fertilizer and pesticide use. The decoupling of support causes a deterioration in the production economics of milk and beef production, while the production of pigs, poultry and animals for fur is not directly affected.

The decoupling of support is expected to pull in the direction of more extensive grass production in agriculture. The
introduction of support for permanent pasture and the provisions on cross-compliance may also be expected to lead to a more environmentally friendly organisation of agricultural production. Decoupling also helps to reduce alternative expenses in connection with the alternative use of agricultural land, e.g. for leisure and hobby activities provided the areas concerned can continue to serve as a basis for the payment of decoupled support.

Rural Development

The Danish rural development programme

The food sector, which comprises both the primary agricultural industry and manufacturing and processing industries etc., has great potential as a driver of growth in Danish society, and the industry is of particularly great significance in rural areas. At the same time, the primary producers play a great role in managing a valuable natural and cultivated landscape.

Rural development policy forms an integral part of the Common Agricultural Policy (CAP). The rural development programme is an important political instrument to attain the goals of the EU Lisbon Agreement on growth and employment in combination with the sustainable use of natural resources.

The rural development programme supplements the other measures in the CAP in several ways. Rural development support complements the direct support under the CAP, partly by promoting sustainable and competitive agricultural and forestry production, promoting positive externalities from
agriculture, including on the environment and nature, and diversification of the economy.

The EU rural development policy has been introduced in recognition of the fact that development in rural areas is generally slower than in the rest of the country. At the same time there is a trend towards agriculture being of declining significance to employment in rural areas. The rural development programme aims to contribute to improve living and working conditions in rural areas. This is to ensure that the land and nature are managed on the basis of the principle of sustainability to the benefit of future generations.

To date the previous Danish rural development programme has been principally focused on primary agriculture, including the promotion of particularly environmentally friendly land use. In the present programme the focus is being extended to a greater degree to the food chain and activities in the rural areas not directly linked to the food sector. General development in the rural areas is to a greater extent now the main issue.

The Rural Development Regulation provides a way of promoting knowledge and improving human potential and restructuring and developing physical potential. These opportunities are exploited in the rural development programme to boost the development of new products, processes and technologies and contribute to the dissemination of knowledge, which creates a market for these new products, processes and technologies. The dissemination of knowledge thus supports market opportunities for the innovative results achieved, for example through cooperation projects.

The Danish rural development programme is an implementation of the EU regulation on support for the...
development of rural areas. The overall aim of the regulation is to promote sustainable development in rural areas as a supplement to market policy. This overall aim is expressed through four overall goals for the programme:

- Greater competitiveness in the agricultural, food and forestry sectors
- Attractive living conditions in rural areas, which contribute to strong cohesiveness between countryside and town
- More entrepreneurs and local jobs in rural areas
- Varied landscapes, rich nature and a clean environment.

*Greater competitiveness in agricultural, food and forestry sectors*

One of the main objects of the programme is to strengthen business development in the agricultural, forestry and food sectors in order to boost innovation and competitiveness. Emphasis is put on creating better coherence between research, application-oriented development, testing, demonstration and final investments.

Innovation activities aims at creating new and better foods of high quality, including organic food production. There is a focus on investments in better animal welfare, as well as on the development and application of new environmentally friendly technologies. This includes non-food production, primarily aimed at increasing the supply of sustainable energy sources.

*Attractive living conditions in rural areas, which contribute...*
Attractive living conditions in rural areas depend on a large number of factors such as job opportunities, supply of services and quality of nature. Circumstances differ from one place to another, and the challenges are not identical. A commitment is therefore made to local forms of cooperation, which in the individual rural areas establish better conditions for good quality of life. If good quality of life is to be attained in rural areas, it is important that people have an opportunity to create their own frameworks and influence their own local area, so that they have the greatest possible influence on their own living situation. The initiative will therefore be implemented via local action groups.

The initiative is equally divided between a targeted initiative to create jobs and more general measures that improve living conditions in rural areas. These activities should be seen in the light of the challenges which the Ministry of the Interior and Health and the Ministry of Food, Agriculture and Fisheries have identified through their cooperation on the 2004 rural development report (*Landdistriktsredegørelse*). Especially in relation to the structure of business life – including the employment and housing situation – there is considered to be a need for improving the situation, particularly on the islands and in the other peripheral municipalities.

The quality-of-life initiative focuses on creating more cultural facilities, easing access to information and communication technology, contributing to creating the necessary service facilities and providing better opportunities to utilise nature in rural areas, etc. The purpose is to make these areas more attractive places to live.

Local action groups can be established throughout the country. However, only approved action groups can obtain support under the rural development programme and only
projects proposed by the relevant local action group will be able to receive support.

The selected local action groups will devise development strategies and help to activate and utilise the local development potential, in close cooperation with other regional and local strategies and plans.

The close coordination of policies and strategies will be ensured by involving municipal councils and growth forums in connection with the preparation of the development strategies of the local action groups.

More entrepreneurs and local jobs in rural areas

The EU’s strategic guidelines for rural development policy indicate that the EU’s Lisbon employment target is to be pursued with the help of the rural development policy. These objectives are pursued with the special long-term commitment to ensure the competitiveness of the food industries: a commitment that also reflects the EU’s strategic guidelines and emphasises knowledge-transfer, innovation and quality as focal areas for efforts to improve the competitiveness of agriculture and forestry.

The initiative to increase the number of jobs focuses on lending support to entrepreneurs in rural areas. It may be farmers who diversify their activities and partly convert to non-agricultural activities. Or it may be entirely new entrepreneurs who convert new ideas into business, or it may be tourist activities which use the special qualities of the areas.

Varied landscapes, rich nature and a clean environment

The environment and landscape in Denmark will be improved via implementation of the Aquatic Environment Plan III initiative for the establishment of wetland areas and set-aside
land in border strips next to lakes and watercourses. At a secondary level, objectives relating to multifunctional agriculture and forestry will be pursued, including the promotion of organic farming. The two initiatives, together with action to implement existing agreements on environmentally friendly agriculture from previous programmes, will contribute to compliance with the commitments under the EU Natura 2000 Directive and Water Framework Directive.

In the light of the nature- and environment-related challenges expected due to the implementation of the Water Framework Directive and the Natura 2000 directives, a more project-oriented approach will be adopted to fulfil the nature and environmental goals in geographically defined areas.

Through preservation and development of nature-friendly methods of agriculture and forestry the initiatives will also contribute to fulfil Denmark’s commitments in relation to the preservation of biological diversity and the aims of the Kyoto Protocol to limit climate change.

In addition, an initiative to maintain agricultural production on selected islands with specific obstacles for agricultural production will be continued. A number of small and medium-sized islands have been designated as less favoured areas in Denmark.

**Agriculture and climate changes**

**Adaptation**

In the coming 100 year period climate changes are expected, for the most commonly used emissions scenarios, to lead to increases in the annual mean temperature of 3-5°C. The winter precipitation will increase by 20-40% and summer
precipitation will decrease by 10-25%.

Danish agriculture will be favourably positioned with respect to the expected effects of climate changes on production potential. Utilisation of this potential requires adaptation in cropping and management practices.

A distinction can be made between short-term adaptations, which aim at optimising production under current conditions, and long-term adaptations, which involve changes in production structure, land use, irrigation systems etc. and development and adaptation of new crop species and varieties.

Most adaptations can happen autonomously in the sector, i.e. without overall control and planning. However, this requires that the climatic changes occur sufficiently slowly. Furthermore changes in climatic conditions require that older data and experience are used with caution.

A regulated and controlled adaptation is expected to be particularly relevant within drainage of lowlands, irrigation, fertilisation and crop protection.

Increasing winter rainfall and rising sea level will in Denmark in some lowlands give rise to flooding or so high ground water levels, that agricultural land use is made difficult or impossible. This may in particular occur along the coast and river valleys. The problem may in some cases be solved by improved drainage and dike building, which, however, may have negative consequences for nature and biodiversity. Alternatively, these areas will have to be abandoned for agricultural use.

A large proportion of the sandy soils are irrigated. This requires permission for ground water retrieval. Higher
summer temperatures and longer periods of drought may increase the need for irrigation of agricultural crops. This can have negative consequences for the flow in streams and rivers, and there may therefore be a need to revise existing permissions for ground water retrieval.

Under the existing production conditions and environmental regulation climate change in Denmark is expected to lead to increased losses of phosphorus and to some extent nitrogen to the environment.

The Danish Action Plan for the Aquatic Environment will be subject of a mid term review in 2008. In the review the potential consequences of climate changes on emissions from agricultural production will be taken into account and appropriate measures will be introduced. The aim is to secure the environmental goals set by the Danish government.

Most disease and pest problems in crop production are closely tied to the crop type and to climatic conditions. If climatic changes result in changes in crop choice, the extent and the character of the disease and pest problems will change. Higher temperatures will reduce the generation time for both pests and diseases, and milder winters will also improve winter survival of both pests and their natural enemies. It is likely that higher temperatures will increase the crop protection problems in agriculture and thus the need for pesticide use.

The Action Plan on Reduced Pesticide Use will like the plan for the aquatic environment be subject of a mid term review in 2008. The implications on pesticide use of potential new crop protection problems will be analysed as part of the review.

Furthermore the Danish government has initiated a series of projects aimed at giving more solid knowledge on how the
agricultural sector is affected by a changing climate and how to adapt in the most effective way.

**Greenhouse gas emissions from Danish agriculture**

Denmark has a commitment under the Kyoto Protocol to reduce greenhouse gas emissions by 21% from 1990 to 2008-12.

The agricultural share of national emissions in Denmark is about 18%. These emissions originate from methane (CH\textsubscript{4}) caused by enteric fermentation and manure handling and from nitrous oxide (N\textsubscript{2}O) emissions due to the turnover of nitrogen in manure and in agricultural soils. From 1990 till today emissions in the agricultural sector have been reduced by 26 % (From 13,04 m. t. CO\textsubscript{2} eq. /year to 9,60 m. t. CO\textsubscript{2} eq. /year).

This is mainly a result of the Danish Aquatic Action Plans, which have resulted in higher nitrogen use efficiencies and thus a reduction in nitrous oxide emissions. There has also been a small decline in fossil energy use in agriculture and a larger reduction in lime consumption, which have also reduced CO\textsubscript{2} emissions.

The continued implementation of the Aquatic Action Plans together with the effect of increasing efficiency in the agricultural sector is expected to cause a further 0,1 – 0,2 m. t. CO\textsubscript{2} eq. /year reduction in green house gases until 2012.

It is estimated that Danish agriculture may contribute to a further reduction of emissions of greenhouse gases in Denmark by 1 to 3 m. t CO2-eq./year. A number of measures, including energy crops, biogas and changes in cattle feeding, have considerable potential.
Land

In 2004, the Danish Planning Act was amended as part of a reform of local government structure. The changes gave the popularly elected municipal councils the key role in spatial planning in Denmark. The municipal councils got the task of preparing a coherent and coordinated plan for land use in both urban and rural zones. The municipal councils thus assumed responsibility for most of the planning tasks previously managed by regional planning authorities.

Through the amendments municipal councils have improved opportunities to establish objectives for development in the entire municipality and thereby ensuring coherence in planning and an appropriate balance between development in cities and towns while protecting the qualities of the countryside.

The 2006 National Planning Report describes the principles to be adhered to in the planning. In the National Planning Report the government states that urban development must be managed and that undesired urban sprawl should be avoided. Open landscapes, natural features and attractive townscapes are decisive for Denmark’s potential to ensure good living conditions in Denmark and to attract companies, employees and tourists in the future.

Further, access to nature and tranquil landscapes near cities are important for most of Denmark’s population. Thus developed areas should be relatively densely built so that other areas can be remain as unspoiled nature/landscapes.

Concerning the Copenhagen Metropolitan area, a national planning directive from 2007 ensures clear demarcation between urban and rural zones. Converting rural and green wedges between and around the urban areas into urban zones is prohibited.
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