

# Corporate Social Responsibility Report 2011



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Responsible Care®



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Front page picture: Harvesting rice in Thailand.

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# Introduction



"We have reached many important goals and initiated significant activities. We are now working on setting new long-term goals. The targets will ensure that Cheminova's mission continually is translated into higher food production through more efficient, safe and environmentally friendly plant protection."

Kurt Pedersen Kaalund

## Helping you grow - Chemistry with care

In order to better visualize how Cheminova's mission is reflected in a long-term CSR perspective, we will during 2012 elaborate on the target "Helping you grow - Chemistry with care".

We will through our product range contribute to increase food supplies, reduce exposure to chemical products and use fewer resources to produce products. We will therefore increasingly address and make transparent our initiatives related to one of the world society's biggest challenges which is to feed the earth's growing population. The idea is to develop an index that can actually measure and illustrate the momentum on this and other goals, like we do on our other strategic and financial goals. Already in this report we present an article on how we develop new products in regard to "Helping you grow - Chemistry with care".

A recurring theme in previous CSR reports has been the implementation of Cheminova's ambitious plan to phase out the most toxic products, known as WHO class I, in developing countries.

We are the first company in the industry that has completed such an ambitious phase-out plan and have subsequently been able to focus on new tasks. Among these are our village projects which in line with our mission aims at demonstrating that living conditions for common people in rural areas can be improved with modern agricultural techniques and proper product use.

The CSR Report for 2011 is in full our annual reporting required of members of the Global Compact. This report describes our progress towards implementing the principles of the UN Global Compact and consequently Cheminova's contribution to the elimination of hunger and poverty, which is a key objective of the UN Millennium Development Goals.

In this year's report we have among other articles chosen to convey the impression of how our company in China is involved in CSR work, as well as an article describing the procedure for approving the industry's products. These approvals are based on a scientific basis with ever increasing demands that contribute to reduce the risk of using plant protection products.

Our many stakeholders have in 2011 shown great interest in our work on CSR and the dilemmas and challenges associated with it. The dialogue has given us valuable input and inspiration to our efforts on this part of our business.

It is my colleagues' and my wish that this report will be well received and will create a basis for a continued positive dialogue on CSR.

Kurt Pedersen Kaalund  
President & CEO  
Cheminova A/S



# About the report

This report provides a status on Cheminova's work within the area of Corporate Social Responsibility (CSR) in 2011 and thereby fulfils the reporting requirements set out in Section 99a of the Danish Financial Statements Act (Årsregnskabsloven) in accordance with the exception in paragraph 7. The CSR report provides information about Cheminova A/S, all subsidiaries and joint venture companies with an ownership of more than 50%. The target audience of this report are employees, future employees, the authorities, shareholders, customers and suppliers as well as any individuals and organisations who may have an interest in Cheminova.

It is our wish that the report with its detailed articles on specific activities from 2011 will provide the reader with insight and understanding of the scope of our CSR work, and how these activities are an integrated part of the day to day business of the company.

## Global Reporting Initiative (GRI) and Global Compact

The specific reporting on GRI indicators is undertaken at level B and provides a systematic overview of our activities. Furthermore, the report provides an update on our progress under each of the ten principles of UN's Global Compact. These items are reported in separate chapters of the report.

## Organisation of the CSR work

Organisationally, the CSR work is rooted in Cheminova's top management, the Global Executive Committee (GEC), with whom the CSR work has been agreed and who has approved this report. The focus areas are selected by the CSR steering group with the objective of providing an enlightening and systematic



Exchange of experience with an Indian subcontractor.

reporting on our CSR activities within a number of important areas.

The inspiration for selecting the specific issues addressed in the present report is based on input and feedback from the stakeholders which have shown an interest in Cheminova's CSR activities throughout the year.

## Content of the report

The report includes facts and short sections on fulfilment of set targets. Furthermore, the report contains detailed articles on progress in selected focus areas from 2011 and special initiatives with importance to our business area. The CSR targets and focus areas for 2012 and onwards are presented as an overview table and as a detailed action plan for the individual focus areas. Additional information on Cheminova's CSR activities including progress on the 2011 focus areas and the targets for 2012 is available on our home page [www.cheminova.com](http://www.cheminova.com).

## Dilemmas and shared responsibility

It is Cheminova's mission to contribute to the world's food supply. Efficient agriculture is one of the prerequisites for achieving the UN goal 'End poverty 2015 – The Millennium Development Goals', which among other things are about reducing hunger, poverty, child mortality and improving public health. Nevertheless, Cheminova faces a number of dilemmas as a supplier of products to societies and countries where the conditions are significantly different from those in Denmark, in particular when it comes to safety and correct use of the products. As a company we have a shared responsibility to improve environmental and working conditions, especially in connection with our own production in developing countries, but also through supplier control and product stewardship. The CSR report describes how we address such issues.

# Openness and Dialogue

There was great interest and inquisitiveness at the open house arrangements in 2011.



Cheminova strives to ensure and engages in a continued dialogue with its neighbours, e.g. the local community, authorities, educational institutions and politicians, while observing the limitations due to stock exchange rules, protection of sensitive personal information and general data protection rules etc., as well as legislation and competition rules impose on openness. We do of course engage in a continued and open dialogue with the relevant authorities in the countries where we operate.

The company actively strives to keep well-informed within the many subject areas of relevance to its operations as well as current and potential business areas. Via open literature as well as scientific publications and trade sources, the press, specific searches on topics and the internet, information and expressions of opinion in respect of CSR related issues are sought. Particularly concerning product properties, side effects and applications, and, in general, issues linked to dilemmas and controversies within the company's sphere of interest.

## Local engagement

Cheminova is an important part of the local society where we operate facilities and employ people. We contribute to the local economy and offer a wide range of job opportunities. We make a point of good neighbour relations and participation in local cultural life and activities. This is of particular importance in geographical areas considered less developed in Denmark and India where we operate. The influence on the environment from production plants is described elsewhere in this report.

In 2011, three open house days were held at the headquarters in Denmark and additionally we had several groups of visitors (students, organisations etc.). Altogether more than 1,900 people visited the premises.

Further, several politicians including ministers have visited our headquarters with the purpose of discussing energy taxes and their implication on energy demanding environmental protection facilities. With the purpose of improving conditions for people and companies in the local area several items were discussed with Danish politicians in 2011 on local, regional and national level, e.g. location of a new hospital, pre-hospital response and infrastructure/highway.

Our operation in India has collaborated with the Gujarat Pollution Board on a seminar on plume reduction. A number of industry leaders participated in the meeting, which had Cheminova's pioneering efforts in this area as basis for the discussions.

## Investors

Of primary interest to stock market analysts, a number of investor meetings are held both physically and online and are thus accessible to all stakeholders, including the more than 7,500 shareholders of the parent company Auriga. Shareholders also receive shareholder letters which, like the investor presentations, provide updates on CSR activities. This material is publicly available on Auriga's and Cheminova's websites.

## Customers and suppliers

CSR forms part of the dialogue with the company's customers, many of whom appreciate to cooperate actively

with Cheminova in promoting product stewardship and environmental responsibility among farmers. Information on the safe use of products – as mentioned in the section on product stewardship – is an integrated part of the marketing of products to end-users in developing countries.

Suppliers are audited with focus on the environment, safety and labour standards in accordance with the company's Supplier Code of Conduct which forms the natural basis for a constructive dialogue.














## Employees












In 2011, there has been focus on integration of the company values in the everyday activities. A range of examples have been pulled together to illustrate how the values live in the daily business. These cases will be compiled in a value leaflet, at first in English and Danish. The leaflet will be distributed throughout the organisation in 2012 and is meant to address the impact of the company values on specific working situations for the individual employee.

Like last year, monthly newsletters including topics on CSR related issues were sent to employees in all subsidiaries in 2011. CSR is regularly discussed throughout the global organisation in relation to the daily business both at the local level and at the headquarters in Denmark, e.g. the works council in Denmark has had the company's policies, general wellbeing of employees and continued education on the agenda.

# Fulfilling CSR targets for 2011

Overview of targets and fulfilment. Fulfilment of the specific areas is described in the paragraphs "Follow up on targets" in the individual sections of the report.

Target	Fulfilment
<b>Product stewardship</b>	
FAO's Code of Conduct shall be included as part of the general sales conditions. Compliance with FAO's Code of Conduct will be an integrated part of Cheminova's general sales conditions	 Implemented by Cheminova A/S. The subsidiaries are in the process of translating to local languages and adjusting to country specific statutory requirements
Further country/market specific improvement/adjustment of the safe-use film	 The safe-use film has been improved and adjusted according to input from subsidiaries
<b>Village projects</b>	
India: The projects in the nine selected villages will be continued in 2011-12 with implementation of adjustments based on the experience gained	 Continued as planned
India: Impact assessments and implementation of specific improvements identified to be undertaken in two villages	 Accomplished as planned
India: Project 'Aakash Ganga' on water conservation to be initiated in five villages	 Project initiated in one village
India: Project 'Saheli' on women empowerment on safety, health and livelihood to be initiated in four villages	 Initiated as planned
Brazil: Project among small-scale banana farmers in the state of Goias to be continued in 2011-12.	 Continued as planned
Brazil: A new project on community development and safe and environmentally friendly control of plant diseases to be launched among small-scale banana farmers in the state of São Paulo in 2011	 Delayed because of flooding
<b>Production</b>	
India: The environmental management system of the production at the Technical Division will be certified in relation to ISO 14001 and OHSAS 18001	 Certificates received
India: Reduction of energy consumption at the Technical Division by 3% per produced volume	 Energy consumption reduced by 36% per produced volume
India: Reduction of water consumption at the Technical Division by 5% per produced volume	 Water consumption reduced by 32% per produced volume
India: Reduction of the COD emission from the Technical Division and the intermediate plant by 5% per produced volume compared to 2010	 COD emission reduced by 8% per produced volume
Denmark: Certifying of the company's environmental management system in relation to ISO 14001 and OHSAS 18001 to be maintained	 External audit accomplished in September. Three small nonconformities corrected

Target		Fulfilment
<b>Production</b>		
Denmark: Continuous optimization of energy consumption through retention of the certified energy management system according to DS/EN 16001 and compliance of the Danish Energy Agency's demands on energy management according to DS/EN 16001		External audit accomplished in September. One small nonconformity corrected
Denmark: Education and training of the employees' attitude and behaviour in order to achieve fewer accidents and errors		Accomplished as planned
Australia: Reduction of absenteeism due to accidents		No accidents in 2011
Australia: Environmental certification according to ISO 14001 to be maintained		External audit accomplished in September. Two small nonconformities corrected
Australia: Obtain a safer behaviour among the employees. The policy is updated and training programmes for all permanently employed are accomplished		Accomplished as planned
Australia: Quantity of waste for recycling to be increased by 5%		Quantity reduced from 194 to 160 tonnes. The part of waste for recycling has been reduced from 80.2% to 77.6% of the total quantity of waste
<b>REACH – New EU chemicals regulation</b>		
Registration of the pre-registered substances that have to be registered before the end of 2013		Plan is followed
<b>Supplier management</b>		
In each of Cheminova's regions the supplier management will be rooted with a person with a technical background		Persons have been selected and trained except for Region International
<b>Human Resources</b>		
Whistleblowing: Spread the knowledge of the whistleblower function to all employees of the global organisation		Updated 'Code of Business Principles' has been distributed to all employees of the group
Mission, vision and values: Maintain the knowledge of the company's mission, vision and values among the employees of the global organisation and ensure that the values 'live' in the daily life		Leaflet planned to be published in 2011 will be published in 2012 in Danish and English
Anti-corruption: Communication of the company's anti-corruption policy will be accomplished in selected subsidiaries		Special efforts have been made to communicate and assess the knowledge of our anti-corruption policy in three countries: India, Mexico and Russia

# CSR targets for 2012 and beyond

New targets have been established for the years to come. The targets are described in greater detail in the action plan on page 30. The work on the targets which were not achieved in 2011 will continue in 2012.

## Village projects

### India

- In 2012, further 12 hectares will be included in the project "Aakash Ganga" – conservation of rain water that otherwise would be lost through run-off.
- The project "Saheli" on women empowerment on safety, health and livelihood will be increased with five villages in 2012.
- Impact assessment of village projects will be increased with two model villages in 2012.

### Brazil

- The project among small-scale banana farmers in the state of Goiás will be continued in 2012.
- In 2012, a project on community development plus safe and environmentally friendly control of plant diseases will be launched among small-scale banana farmers in an environmentally sensitive area in the state of São Paulo.

## "Helping you grow - Chemistry with care"

- Long-term targets will be prepared on the basis of one or more of the below:
  - o An index illustrating the farm land where the crops and thus the food production is protected by Cheminova's products.
  - o An index illustrating the quantity of Cheminova plant protection products used per area unit.
  - o An index illustrating selected, essential resources used by Cheminova to manufacture plant protection

products compared to the area of farm land treated.

- At least 20 formulations with low content of volatile organic solvents will be developed in the period 2012-14.
- Lower average toxicity of newly developed formulations measured through classification of the formulations in the years 2012-14.

## Production

### India

- The energy consumption for the production of three large products will be reduced by 3% per produced volume in 2012.
- The frequency and seriousness of both incidents and accidents at work will be reduced by 5% in 2012.
- The production at the Intermediate Division will be certified in relation to ISO 14001 and OHSAS 18001 not later than mid-2013.

### Denmark

- Re-certification of the company's environmental management system in relation to ISO 14001 and OHSAS 18001. Certifications to be maintained in 2013-14.
- Certification of the company's energy management system in relation to ISO 50001 in 2012. Certification to be maintained in 2013-14.
- Education and training of employees in better attitudes and safer behaviour according to the programme SAFE is spread to the global organisation in 2012-13.
- The quantity of hazardous waste from the production of a fungicide will be reduced by half in 2012.

- The energy consumption for production of an insecticide will be reduced by 8% in 2012.

### Australia

- The water consumption in the manufacturing cleaning process will be minimized in 2012 as part of the site's Water Conservation Programme.
- It will be ensured that external contractors in 2012 work in compliance with site health, safety and environment requirements.

## REACH – New EU chemicals regulation

- Registration of the pre-registered substances that have to be registered before the end of 2013.

## Supplier management

- In 2012, the supplier management in Region International will be rooted with a person with a technical background.

## Human Resources

- A leaflet with narratives about the company's values will be distributed to all employees of the group in 2012.
- In 2012, all managers in Denmark will implement the company's values to own employees through meetings or other activities.
- In 2012, a global HR strategy for 2012-2015 will be prepared. The strategy will support the business strategy for Cheminova.
- In 2013, an employee survey will be accomplished in the global organisation to investigate employees' knowledge of the company's values.



# Cheminova's business area

Cheminova's primary activities are the development, production, marketing and sale of chemical products for the protection of agricultural crops world-wide.

The framework for the company's business activities is Cheminova's Code of Business Principles and Cheminova's mission, vision and values. These support and are consistent with the UN Global Compact, the Danish version of the European Chemical Industry Council's (CEFIC) Responsible Care programme and the FAO Code of Conduct.

## Need for plant protection

UN's Agriculture and Food Organization FAO estimates that by 2050 70% more food than today has to be produced - at roughly the same agricultural area, which is already under cultivation. The yield per hectare should increase significantly just to keep pace with the growing population. A consequence will be an increasing need to protect crops, which falls well within our mission and business area.

## Products

The company produces herbicides, insecticides and fungicides. The products are sold primarily as ready-to-use plant protection products under our own brands, own registrations (use permits) and labels. Registration work is detailed in a separate article (see page 16). On Cheminova's website a brief description of the general approval conditions for plant protection products can be found.

Cheminova also supplies active ingredients which are used for further processing to produce ready-to-use plant protection products. Moreover, we also manufacture and sell a number of fine chemicals for industrial use as well as micronutrients for agriculture.

Cheminova is a member of various professional organizations like CropLife, resistance management groups under CropLife, The Confederation of Danish Industry and The Process Industry Association as well as local industry organizations.



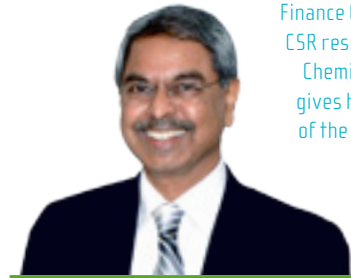
Our products are primarily used for plant protection in professional farming.

Development, testing - and a lot of agricultural products at a local market.

# Village projects in India

About 455 million people in India (about 38%) live on less than 1 USD per day, a poverty line defined by the World Bank. Cheminova India has selected a few remote villages across agro climatic regions projected as "Cheminova Model

Village" with an objective of making available the scientific knowledge of modern agricultural practices and facilitating support in a small way in basic needs in education, health, hygiene and empowerment of women.



Ajit Inamdar, Chief Finance Officer and CSR responsible in Cheminova India gives his account of the impact assessment.

## Model villages – impact assessment

Cheminova India's model villages are developed with the objective of adding value to socio-economic aspects of the farming community. Our focus is on 3 key aspects, advisory services, education-health-hygiene and safe use of pesticides under our model village activities. Besides these, specific women empowerment initiatives have also been initiated in the villages. The programmes have brought in a change in the practices and have improved the image of the company in the eyes of the stakeholders.

## External impact assessment

The recent impact assessment accomplished in two of the model villages has brought out interesting insights and the opportunities for improvements. Two evaluations, one each in the model villages of Ksheerasagar in Andhra Pradesh and Pabdara in West Bengal, were completed for the activities of 2011. The Pabdara assessment was done by the Royal Danish Embassy while the Ksheerasagar evaluation was done by N.G. Acharya, Ranga Agricultural University. The findings and recommendations are briefed here:

## The village Pabdara

The assessment was made based on the benchmark from 2010 in the areas of economic conditions, political and institutional, sociocultural and environmental. The findings from Pabdara are provided in the table.

## Assessment of the village Pabdara made by The Royal Danish Embassy:

Activities	Impact
1) Training: Training on safe use and handling of crop protection products	<ul style="list-style-type: none"> <li>• Increase in outreach of farmers with 40%.</li> <li>• Considerable improvement in practices for safe handling was evident.</li> <li>• Women stores chemicals in lofts beyond reach of children.</li> <li>• Recommended dose of chemicals only.</li> <li>• Farmers are more likely to stop smoking while spraying in the fields.</li> <li>• 25% reduction in cost of cultivation.</li> <li>• Seeing value in Cheminova's packages of practices.</li> </ul>
2) Distribution of safe-use kits / medical kits	<ul style="list-style-type: none"> <li>• 60% farmers have been benefitted.</li> <li>• Farmers would continue to use personal protection.</li> <li>• No burning sensation in eyes and hands now.</li> <li>• Stopped mixing chemicals with bare hands.</li> </ul>
3) Trials and demonstrations done on more crops in 2011	<ul style="list-style-type: none"> <li>• Created visibility for Cheminova.</li> <li>• More acceptance of Cheminova recommendations.</li> <li>• 100% farmers have accepted that improved output is attainable.</li> </ul>
4) Soil testing	<ul style="list-style-type: none"> <li>• Helped to reduce fertilizer input cost.</li> </ul>
5) Health: Provided medical unit in the local school	<ul style="list-style-type: none"> <li>• Students expressed happiness and benefits.</li> </ul>
6) Support in student education by providing books	<ul style="list-style-type: none"> <li>• Children and local families benefitted and associated with Cheminova.</li> </ul>
7) Community development activity - keep the village clean campaign	<ul style="list-style-type: none"> <li>• Community is self-motivated to keep the surroundings clean.</li> <li>• Mosquito nuisance is reduced.</li> <li>• Want to continue.</li> </ul>
8) Saheli launch - 30 women participated in the safety training programme	<ul style="list-style-type: none"> <li>• Women appreciated their learning and are aware of precautions to be taken.</li> <li>• Will ensure that the men use personal protection.</li> </ul>
9) Medical camp for gynaecological and paediatric problems	<ul style="list-style-type: none"> <li>• More than 250 women participated and benefitted.</li> </ul>
10) Education on livelihood	<ul style="list-style-type: none"> <li>• More than 100 women participated.</li> <li>• Shown confidence in Cheminova and eager to learn more to improve their livelihood.</li> </ul>

With the village projects we are supporting more of the the UN Millennium Development Goals:

"Eradicate extreme poverty and hunger", "Achieve universal primary education", "Promote gender equality and empower women" and "Reduce child mortality rates".

#### Key recommendations:

- To a greater extent make the community a partner to plan activities in co-operation with them.
- Formation of farmer groups.
- Review of the project on quarterly basis to plan a smooth exit process for Cheminova.



#### UN's Millennium Development Goals

- 1) Reduce by half extreme poverty and hunger by 2015
- 2) Achieve universal primary education
- 3) Promote gender equality and empower women
- 4) Reduce child mortality rates
- 5) Improve maternal health
- 6) Combat HIV/AIDS, malaria and other diseases
- 7) Ensure environmental sustainability
- 8) Develop a global partnership for development

Assessment of the village Ksheerasagar made by N.G. Acharya, Ranga Agricultural University:

#### The village Ksheerasagar in Andhra Pradesh

- All farmers were interested in getting advice from Cheminova staff on vege-table cultivation.
- 49% of farmers moved from low/medium knowledge to high level, indicating that the project benefitted them in better understanding of pests and diseases, pest management practices, fertilizer management and overall crop management practices.
- Advisory services helped 59% of farmers to move from low to medium/high level of adoption of improved practices.
- Per acre return was increased with the cost benefit of 1:1.35. There are potentials to improve this ratio further.
- The project helped in the adoption of safety practices. All the respondents were using face mask and about 88% used head gear and 54% used gloves and shoes.
- 72% of farmers are burying the used containers in the field and the rest have started cleaning them before disposing.
- All respondents have reported improved knowledge of sprayer upkeep and maintenance.
- All villagers have expressed their desire to continue the practices of the project and meant that they have understood the pitfalls of their farming practices and would overcome with Cheminova's assistance.

Though the assessors have not given any specific recommendations for Ksheerasagar we will work to improve the activities from our learning and implement relevant initiatives in this direction.





"Farm women empowerment (Saheli)  
– a Cheminova India initiative"

> Read the article on [www.cheminova.com](http://www.cheminova.com)



"Prospects of conserving water  
in rainfed agriculture","

> Read the article on [www.cheminova.com](http://www.cheminova.com)



Dairy at village level operated  
by women.

### Farm Women Empowerment programme (SAHELI)

Saheli is an initiative towards Responsible Care to educate the rural women on safety, health and livelihood. We have innovatively coined the name Saheli taking the first two letters from each of the three core areas Safety, Health and Livelihood. In Hindi Saheli means a friend, particularly a woman. In any society, women are always well wishers of their families. They have an emotional connection with everyone in the family and are most concerned about the wellbeing of everyone in the family. Saheli aims at spreading the message of safety to the men through the women in the community. In addition to safety, we educate them in the areas of personal health, cleanliness, hygiene, animal husbandry, child nutrition, saving for the future, etc. to provide them with a comprehensive knowledge which would empower the women. Read more in the article "Farm woman empowerment (Saheli) – a Cheminova India initiative" which can be found on our website.

### Prospects of conserving water in rainfed agriculture

Cheminova India is looking at the prospects of conserving rain water for growing better crops by demonstrating simple techniques of water conservation. To create an interest, farmers were made aware that water lost as run-off belongs to them.

"It is your water that goes down the drain. Save it to gain more" was the approach adopted. The project implemented in the pulse growing belt of Gulbarga was more than an eye opener to many farmers. When the farmer harvested more with a cost benefit ratio of 1:12.8, the project helped us to conserve an estimated quantity of 50 million litres of water. Dr. Gangadharan Shankar, CSR Coordinator in 2011, briefly describes the project and its outcome in the article "Prospects of conserving water in rainfed agriculture" which can be found on our website.



Dr. Gangadharan Shankar, Senior General Manager, Business Development, tells about two projects.



# Banana project in Brazil



The environmentally benign application of the fungicide flutriafol shows promise as an important tool for improved cultivation of bananas in the small-scale farmers communities in Brazil.

The vast majority of Brazil's approx. 500,000 hectares of banana crop is grown on small family farms that are considered relatively low-tech and often with less than 10 hectares of land. Use of fungicides is vital to the production in large part of the area. State agronomic advisers consider the two fungal diseases yellow and black sigatoga as the two highest ranking economic important diseases infesting banana plantations. Particularly the black sigatoga is in many areas not only a threat to the quality of the crop but also posing at serious risk that the banana harvest could be destroyed altogether.

## Project in the state of Goiás

In 2010, Cheminova initiated a co-operation with the local farmers association and governmental consultants in plant protection. The purpose being demonstrating to the farming community that improved agronomic practice with environmentally friendly control of plant diseases would help to promote community development and the quality of life among the small scale farmers.

The project is based on new application technology recently developed by Cheminova: With a simple hand-held lance device a few drops of the fungicide flutriafol can be applied precisely on the individual banana plant. By target-

ing the fungicide directly to the plants without diluting and mixing the product this method combines safety in application and protection of the environment with agronomical and economic sound plant protection. Safe handling and use of pesticides as well as correct use of personal protection equipment are integrated parts of the project.

## The new technology helps the farmers

During 2011, the first full year of the project, covering the end of the 2010/11 season and the first part of the 2011/12 season the project has been running as planned. During this period the farmers have gained experience with using the new application method and have already seen some improvement of the yield and quality of the crop. Although no quantifiable data is available the participation in the project and the already observed efficacy of the product has made the farmers very optimistic about the coming harvest being less affected by yellow sigatoga.

## Project in the state of São Paulo

In the identified project area the very aggressive disease black sigatoga is prevalent. If the control of this disease fails there is a very high risk that the banana plants die. It is therefore very important

to be able to control the disease also in environmentally sensitive areas along streams and rivers. Here the new technology with direct application of flutriafol to the axils of the plants is expected to make a significant defence in disease control in an environmentally benign way. This will contribute to improving the quality of life in this particular farming community.

## The technology has been tested

Before launching the project with the local farmers the technology has been tested and validated and recommended by local experts in plant pathology and agronomic technology from Universidade Estadual Paulista and Agência Paulista de Tecnologia dos Agronegócios. Due to heavy rains and flooding it was, however, not possible to start the project at farmer level as originally planned in 2011. The project will be launched in 2012.

## Follow-up on targets

- The project in Goiás is proceeding as planned.
- The project in São Paulo is delayed due to flooding, but the initial technical evaluation has been performed.

# Biology determines the products of the future

Extensive biological testing ensures that Cheminova's new products are benign for human health and the environment, while still being efficient tools for control of weeds, insect pests and fungal diseases.

Development of environmentally friendly products is one of Cheminova's overall strategic goals. This includes products with a better WHO classification and products with a reduced content of volatile organic solvents, meaning that undesirable side effects on human health and the environment are reduced.

## **Efficacy and crop safety is optimized in the same product**

In our efforts to develop environmentally safe products, we do not jeopardize our standards for crop safety and efficacy of the products against insect pests, weeds and fungal diseases. It is important that we deliver products that contribute to increased yield and better quality of agricultural produce. All products are therefore tested during the development phase, first under controlled conditions in our biological laboratories and greenhouses, later under natural conditions in the field in different parts of the world. The results from these tests are compiled and used as documentation in the process of getting approval by regulatory authorities in the countries where we wish to market our products.

The biological development activities are coordinated from Cheminova's headquarters in Denmark by the Global Biological Development department.

Agronomists work closely with technicians on tests in the biological laboratory. Product candidates are tested in assays with insects, weeds or infected plants in pot trials, petri dishes and on microtiter plates. We have the option to test products on a wide range of plant diseases and weeds and sucking, stinging and biting insects. New assays are constantly being developed in order to match the desired development of Cheminova's product portfolio.

One or more candidates are selected from the laboratory tests for further testing in the field. This is done in collaboration with Cheminova's subsidiaries, who have detailed knowledge about local conditions and contacts to independent field trial stations and official institutes, who conduct the trials for us. In Europe, the products will always be tested at field trial stations that can conduct the trials in compliance with Good Experimental Practice (GEP).

## **Mixtures can give a better effect with less active ingredient**

Global Biological Development is also involved when ideas for new products are developed. It can be mixtures of two or more active ingredients. The reason behind mixtures can be synergy between the active ingredients, which will make it possible to reduce the total amount

The products have to be stable and mixable with water of varying quality.







Field tests on chili crops in India.

of active ingredient per hectare for the benefit of the environment at the same time as a high efficacy is maintained. Another reason for using mixtures can be the need to prevent development of resistance in insects, fungal diseases or weeds towards certain plant protection products. Resistance can result in significant loss of yield for the farmers. Cheminova participates actively in IRAC (Insecticide Resistance Action Committee) whose mission it is to promote communication of and knowledge about insecticide resistance. Another important part of the work is promotion of management strategies to maintain the efficacy of products and thereby support sustainability in agriculture and improve public health.

#### Development of ready-to-use products (formulations)

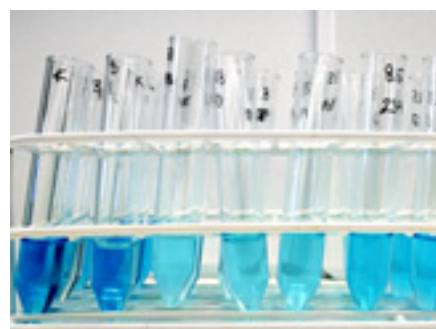
Biological efficacy as well as safe product handling are taken into consideration in developing modern formulations. At the same time, it is our goal to minimize the use of volatile organic solvents in our future plant protection products. This is mainly due to the unwanted side effects of these compounds on human health and the environment. We use the method "Estimation of Volatile Emission Potential of Pesticides by Thermogravimetry" in order to evaluate if a formu-

lation meets the criteria for low or no content of volatile organic solvents. This is a widely recognized standard method, which is being used by the California Department of Pesticide Regulation. We mainly develop formulations that either do not contain or have a very low content of volatile organic solvents. The preferred formulation could be solid or water based or contain less than 20% organic solvents.

#### The goal is to improve product classification

During formulation development we do in general attempt to meet the need for efficient products with mild co-formulants and technologies. It is our goal to improve the average classification of our product portfolio. In the development work we use the WHO classification scheme, but in the future we will take into account the new and more detailed classification tool provided by the CLP classification scheme (Classification, labelling and packaging of chemicals – EU Regulation 1272/2008 – which will be fully implemented in 2015). In this way we wish to improve the products when it comes to worker safety and handling.

Sprouting pollen from tobacco plants has turned out to be a good test model for eye irritation on mammals. In this way we are able to test a large number of test products and identify the best candidates for further development without using test animals.



# Registration of chemical plant protection products is based on science



By Diane Allemang, Executive Vice President, North America,

and Brad Chalk, Communications and Non-Crop Business Manager

The products that Cheminova provides are carefully evaluated by regulatory agencies around the world which have a common mission: To provide farmers with tools that improve their ability to feed and clothe the population with minimal risks to them, their workers, consumers and the environment. As an example, the regulatory authorities in the USA requires more than 100 tests requiring many years and millions of dollars to establish efficacy and safety of a new compound. Some would argue that this is too expensive, too time consuming and that much of the data generated are unnecessary to protect the public and the environment. Others would take the opposite argument and some would ban all crop and public health protection products all together – despite the catastrophic impact on the general population.

What is most clear is that the seven billion humans on our earth today depend upon the agriculture sector to provide them with food. The anticipated population increase will put even greater demand on the agricultural sector. The pressure to determine an appropriate balance of risk versus needs has never been higher.

## Benefit for farmers and consumers

Cheminova respects and supports the need to work closely with regulatory agencies to help them perform what is a difficult but essential task. What we and most other registrants seek is a clear and open dialogue based upon sound science. Ultimately, all parties involved benefit, including the companies that invest the enormous amount of time and money required to register their products.

Consumers benefit because there is nothing more important to them than a safe source of nutritious food for their family. And they want this food to be readily available, attractive, enjoyable and affordable. Farmers, agricultural workers and those people who handle crop protection products benefit because they are given guidance on how to mix, apply and dispose of these products with minimal impact on them and the environment.

## A driver for development

Registrants also benefit from such a process since the result is products that

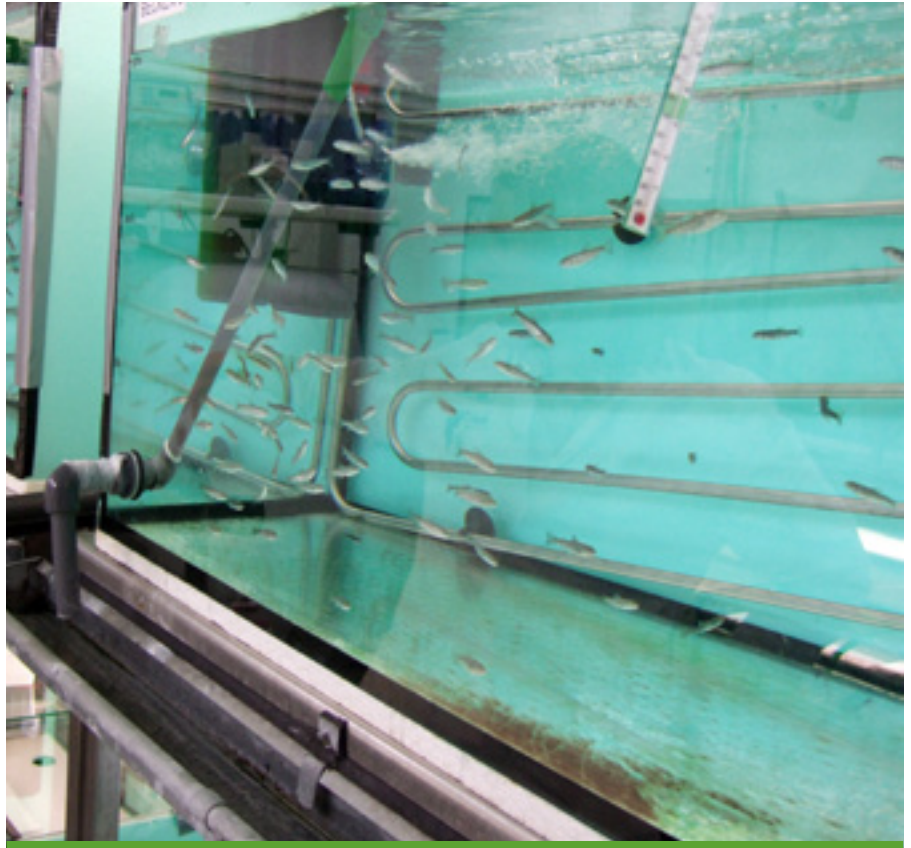
“Cheminova supports the establishment of sound, safe and sustainable policies that bring effective products to the market while protecting farmers, workers, handlers, consumers and the environment. Above all, we believe in an on-going and intensive dialogue that is open to all parties interested in feeding our ever-growing world population.”

have been thoroughly reviewed through a process the public can have confidence in. Furthermore, all companies wishing to register a crop protection product face the same high regulatory hurdles. This screens out organizations with resources that are inadequate to determining just how effective and safe their product candidate may be. The playing field is rigorous but it is level.

Risk assessment forces a continuous improvement upon the capabilities of an organization to generate data that demonstrate product efficacy and safety. These efforts have a secondary benefit of improving understanding of just how the compound under investigation works, leading to the development of even more effective products in the future. Improved knowledge of modes of action enables scientists to enhance activity using less active ingredient, and that is an important goal of regulatory agencies around the world.

Ideally, a pesticide would simply disappear immediately after controlling its target fungus, insect or weed, but in reality most compounds linger in the environment. Where do they go? Many risk assessment tests are designed to answer that question. Some compounds





Test on fish is part of the environmental assessment of plant protection products.

break down into harmless residuals that quickly dissipate with no impact on soil, water or air. Others may pose a potential threat. To register a product, a company must fully understand the fate and be able to measure the threat.

### Extremely sensitive methods are applied

Current technical standards dwarf those in place just a few decades ago. Risk assessment can now detect residues to a sensitivity in the range of parts per trillion where, just a few years ago, the most sensitive tolerances were measured in parts per billion and not long before that, the most attainable goal was expressed in parts per million. The difference in these levels of sensitivity can be best understood when applied to time. One million minutes ago, in 2009, the most powerful leader in the world was Barack Obama while one billion minutes ago, that leader would have been the Emperor Trajan. The year was 108 A.D. There was no world leader one trillion minutes ago for the simple reason that there was no organized society.

### The approval process follows development of science

As a result of these enormous improvements in our ability to understand crop protection candidates, it is natural to want to employ them to improve our understanding of products approved before they were available. In the U.S. and in Europe among others, the authorities have been mandated to do just that and re-evaluation of existing compounds has been underway for years. Not all veteran products make the cut.

The authorities approve the text of the labels.

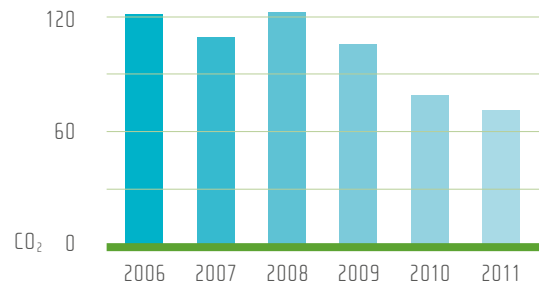


# Impact of climate changes on Cheminova's business

Flooding, drought and climate changes in general make agricultural production unstable many places in the world. At the same time we experience an increased demand for food.

## CO<sub>2</sub> emission

*CO<sub>2</sub> emission from the production sites in India and Denmark. The significant reduction in 2010 and 2011 is mainly due to reduced production in Denmark.*



Cheminova is a global supplier of products for the main agricultural markets all over the world. The overall realm of our business is therefore the total size of food production in the world. As the world population and the standard of living are expected to grow in the future, we expect the potential for our business to grow as well. More food has to be produced from an agricultural area that is constant or even decreasing on a global level.

## Global warming has high local impact

The situation looks different if we leave the global view and go to regional level. The market for plant protection products has always been closely linked to the regional climatic conditions. Variable climate conditions are not a new phenomenon, but according to the climate researchers it is expected that the variations will be more severe and that we can expect a global sea-level rise. Much of the agricultural land in the world is in lowland areas such as river deltas, where transient as well as permanent sea-level rises may result in huge flooding events and loss of crops. We have seen examples of problems in recent years in Southeast Asia and Australia. Seen in this perspective, the global warming may have a negative impact on Cheminova's business on a local level.

## Cheminova reduces CO<sub>2</sub> emission

Like other companies Cheminova is engaged in the consideration on how to reduce global warming. On the one

hand what the society can do, on the other hand what an individual company can do.

Cheminova's efforts can be divided into two areas. One is development of new products requiring fewer resources for manufacture per treated crop area.

Another area is reducing consumption of energy in manufacturing our products. We are, however, subject to international competition, with the implication that an increasing part of the productions will be sourced from toll manufacturers, where we as a company do not have the same influence on the energy consumption related to the production.

We can of course better control the energy consumption related to our own production processes, and the company has made significant efforts to reduce the energy consumption and is committed to continue these efforts. Reference is made to the section on Production. (p. 24).

Development in the CO<sub>2</sub> emission in the period 2006-2011 from our own companies with production of active ingredients is shown in the figure above. It relates to the production facilities in India and Denmark. These two facilities represented 98% of the total energy consumption in the company.

Flooded farm in Australia.



# Biological diversity

The dilemma is to satisfy food requirements from the Earth's rapidly growing population while preserving natural habitats from cultivation. One of the major threats to biodiversity is loss of natural habitats due to expansion of farmland.



In 2011, a discussion of the concept of biodiversity in relation to agriculture was centred on the EU Biodiversity Strategy 2020 which aims to counteract the loss of biodiversity due to loss of habitats for a rich flora and fauna.

In addition to nature with many species being of great value in itself, biodiversity is considered a valuable resource for future generations, although this may be difficult to assess in economic terms.

## Evolution

Habitat changes and species become extinct while others emerge, is a condition of life which can be summarized as the concept of evolution. This is the engine that created the current living nature.

There will always be an ethical debate about the extent to which human activity is allowed to change and exploit nature. This debate has many aspects, one of the more tangible ones relates to industrial society's and agriculture's impact on the environment in general and biodiversity in particular.

That the land is cultivated and the natural vegetation is replaced by agricultural crops, is in any case a serious interference with the natural order.

Since Cheminova's business is to supply plant protection products for use in efficient farming, the consideration of biodiversity is of concern to Cheminova and also our industry as a whole. Read more about natural resorts (Ramsar resorts) close to production sites on our website.

## An efficient agriculture is necessary

UN's food and agriculture organization, FAO, estimates that agricultural production must increase by 70% by 2050, and this objective largely be achieved by making production more efficient on existing farmland. This is a great challenge. But if we continue to farm the most fertile areas among others in Europe, wild nature elsewhere can thereby be preserved and leave room for diversified habitats for biological organisms.

Although agricultural areas contain varying levels of biodiversity, this is normally far greater in non-cultivated landscapes. Therefore it is important to preserve these.

## More effective and gentler products

In order to minimize the agricultural impact on the non-cultivated areas there is a need for continued use of agronomic and technical knowledge. One of these areas is better plant protection products. By using improved products, the farmer can apply less chemistry and still obtain better effect with less environmental impact. Cheminova is dedicated to develop our product range to protect more crop area by less chemistry applied. Under the heading "Helping you grow - Chemistry with care," this is one of our goals for the future.

Specific activities and goals for product development are detailed in article on biology and future products on page 14.



The Danish ambassador in India, Mr. Freddy Svane, hands over a sapling to one of the students from the university in Mumbai.

## Trees for tomorrow

In 2011, Cheminova's subsidiary in India launched a campaign for planting trees entitled "Trees for tomorrow". The campaign was inaugurated by the Danish Ambassador Mr. Freddy Svane, which coincided with the World Wetlands Day on February 2. Mr. Svane presented the first few trees to the students of Garware Institute of Agribusiness Management, Mumbai University. While Cheminova provided the saplings the students volunteered to plant them in their University Campus. In addition, an estimated 2,500 trees have been planted in and around our model villages with the involvement of channel partners, associates and stakeholders.

Further, Cheminova was engaged in mega tree planting activities surrounding the manufacturing facility located in the State of Gujarat. Saplings were provided by the Department of Environment and Forest and planted by Cheminova employees. In all, 5,000 trees were planted at three factory locations and another 5,000 trees on roadside of the manufacturing facilities.



# Profile of Cheminova's subsidiary in China

- CSR assessment of suppliers and Quality Control

The CSR-assessment of Chinese suppliers of active ingredients and intermediates is further supported in quality control analysis of the production conducted at Cheminova's new

QC laboratory in Shanghai. In 2011, Cheminova has carried out more than 20 visits and performed more than 3,000 analyses.



By Roger Ding, Office Manager, Cheminova China

China has around 1,800 agrochemical producers, among these 500 are producers of active ingredients, and they produced 2,262,000 metric tonnes of agrochemical products in 2010. The total number of employees in this segment is around 160,000.

With respect to Corporate Social Responsibility (CSR) we can still see challenges when it comes to issues such as low safety awareness of workers and how the management of Chinese factories deals with safety for human health and the environment. We visit many factories and unfortunately we still see examples of unprotected workers and unsafe handling of harmful chemicals even if the trend is descending.

Cheminova China does not have own production of agrochemicals. However, we require our suppliers to fulfil the Cheminova CSR standards. We will run a first step screening of the manufacturer based on a general impression and as a second step we will send our specialist from the Shanghai office or experts from Denmark for a more detailed audit. Finally, we will provide feedback to the manufacturer on which items they need to improve before we can start our co-operation. We will also visit suppliers unannounced in order to follow up on agreed actions and in order to continue the dialogue on compliance with our Supplier Code of Conduct.

In 2011, we have worked with more than 30 suppliers of active ingredients

and intermediates and we performed one CSR audit, visited 11 new factories and made ten visits at factories we already know.

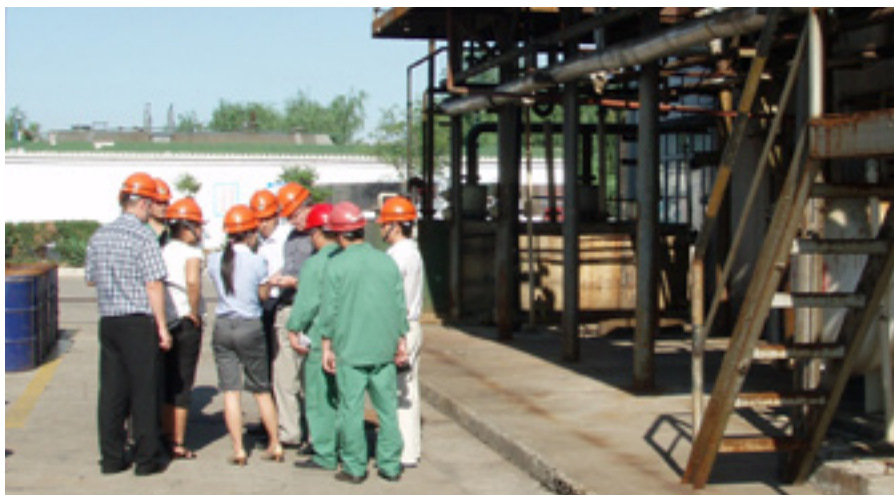
## Introduction of Shanghai QC (Quality Control) laboratory

Cheminova opened a quality control laboratory in Shanghai in 2010. The laboratory is headed by Dr. Yolanda Ke, who has 10 years of experience with analytical chemistry, and she has 2 assistants working with her. The laboratory has one room for analytical equipment, one room for samples pretreatment, one room for packing and one room for retaining samples.

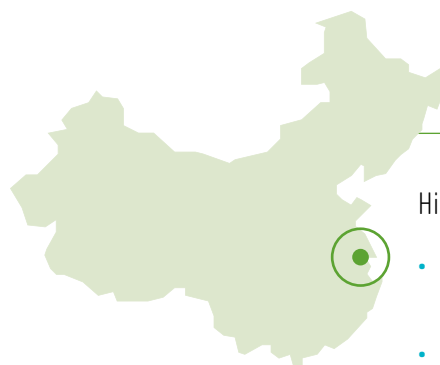
The laboratory is equipped with modern instruments, such as HPLC and GC and other minor apparatuses, including Karl Fischer titrator and Chloride titrator. The main focus is analysis of active ingredients in order to ensure that the products comply with specifications prior to shipment from China.

Analytical methods for quality control of more than 30 products have so far been transferred from the quality control laboratory in Denmark and implemented in the Shanghai laboratory. Quality

Cheminova chemists visit the manufacturers in order to collect samples of active ingredients for QC analysis at the Shanghai QC laboratory.







## History of Cheminova Chinas

- Cheminova Shanghai Representative Office was founded in Shanghai in 1997 with only one employee.
- Cheminova China Ltd was founded in Shanghai in January 2010 with totally nine employees. The company is a pure sourcing subsidiary, mainly doing the consultancy for headquarters and subsidiaries.
- Cheminova opened its own QC laboratory in Shanghai in January 2010 to meet the increasing demands for quality control analysis of pre-shipment samples and quality screening of products from potential new suppliers.

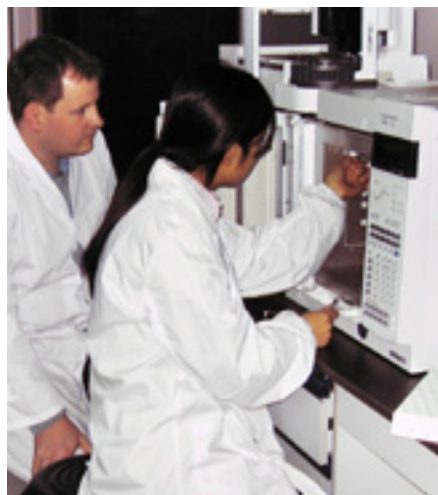
control analyses are carried out on both active ingredients and intermediates. An average of more than 200 analyses was performed each month in 2011.

There is a constant exchange of knowledge between Cheminova's QC laboratories in Shanghai and in Denmark in order to ensure the reliability of QC results. All staff in the Shanghai QC laboratory has an educational background in chemistry and have also been well trained in laboratory health and safety.

The chemical waste from the quality control laboratory is collected by professional waste treatment companies for proper destruction.

## Increased attention to CSR

We see there is great improvement in Chinese agrochemical industry. In early years, it was difficult to find suppliers who shared Cheminova's consciousness for CSR. Now we can see that more and more Chinese companies are paying a lot of attention on CSR issues. Of course there is still room for improvements. There are two drive forces for this development: The multinationals like Cheminova push Chinese companies a lot on the improvement of CSR, and central government pushes a lot mainly because of the heavy influence of chemical production on the environment. We will keep pushing suppliers in China for them to understand and comply with our CSR standards.



Yolanda Ke, Head of the Shanghai QC laboratory, and Klaus Nygaard Jørgensen, coordinating analytical chemist from the QC laboratory in Denmark, are constantly exchanging know-how on analytical methodology and quality control procedures to ensure reliability of QC results from the Shanghai laboratory.

## Agriculture in China

With an area of 9,601,400 km<sup>2</sup> China is one of the largest countries in the world. The area available for agriculture is about 1.1 billion hectares, but only 128.2 million hectares of land is cultivated. The average farm size is 0.1 hectares. The total population of China is 1.33 billion and around 700 million farmers live in the villages. China has experienced Rural Population Urbanization at a rate of almost 1% per year over the past decade.

The Chinese economy has grown consistently by more than 10% for the last 20 years. Agriculture makes up 17.1% of the Gross Domestic Product (GDP), but keep going down with 1% reduction in recent years.

The total domestic agrochemical market in China is around 3.9 billion USD in 2010, corresponding to about 8.8% of the world market. The market in China for plant protection products is divided in this way: Insecticides 36%, fungicides 23%, herbicides 29%.

China increased the total grain output from 132 million tons to 546.41 million tons of food grains from 1950 to 2010. The population increased from 0.55 billion to 1.30 billion in the same period. China can almost support the whole country based on the domestic grain output.

# Sales and product stewardship for plant protection products



Information about safe and correct use of the products is part of the marketing.

## Cheminova's sales in 2011

Cheminova's sales of plant protection products include supplies of both active ingredients and ready-to-use formulations to more than 100 countries. In 2011, Cheminova's subsidiaries handled 89% of sales.

For further comments on sales, distribution between product types and geography, please refer to Auriga's annual report.

## Sales of the most toxic products

With the phase-out of the most toxic products in developing countries an important milestone has been reached in Cheminova's CSR work as all these products have been replaced by less toxic plant protection products. Products belonging to WHO's class Ia 'extremely hazardous' and Ib 'highly hazardous' are no longer sold to farmers in developing countries.

### WHO classification of pesticides based on acute risk

Class Ia	Extremely hazardous
Class Ib	Highly hazardous
Class II	Moderately hazardous
Class III	Slightly hazardous
U	Unlikely to present acute hazard

In 2011, the total sales to all countries of class I products were reduced to appr. 1% of total Cheminova sales. The breakdown of products by countries can be seen in the adjacent table.

## Overview of which class I ready-to-use products Cheminova sold in 2011 and where

Country	Product
Australia	Methyl parathion EC
	Methomyl EC
	Omethoat EC
USA	Methyl parathion EC
Spain	Fenamiphos EC

EC = Emulsion concentrate

## Product stewardship

The underlying principle for Cheminova's stewardship of plant protection products is risk reduction. The cornerstones are:

1. Observance of national legislation concerning approval, marketing and sale of plant protection products in all countries where Cheminova's products are sold. In addition, export is subject to EU legislation and the rules of the Rotterdam convention concerning "prior informed consent" (PIC),
2. Affiliation to the rules of FAO's Code of Conduct,
3. Membership of national/regional trade associations engaged in risk reduction in connection with the use of plant protection products, and
4. Phase-out of all products belonging to WHO Class Ia and Ib outside the USA, Canada, EU, Australia and Japan.

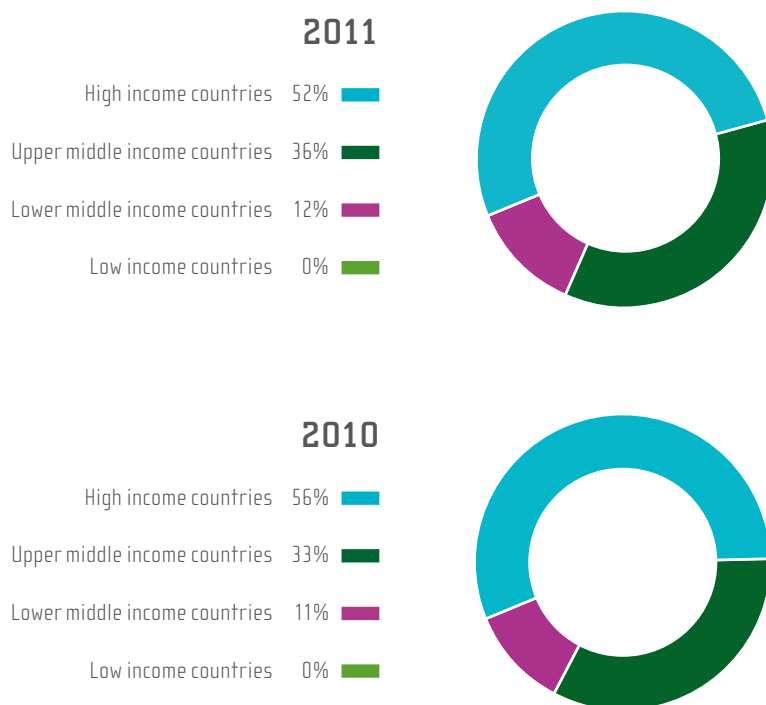
In 2011, training and guidance on correct and safe use of Cheminova's products have been an integrated part of the daily marketing activities in developing countries. Labelling and instructions for use, personal contact with distributors and users plus participation in campaigns are some of the tools employed to promote safety. The quarterly reporting to the CSR steering committee on product stewardship from countries and regions has been continued in 2011. Twice a year the Global Executive Committee meets to discuss CSR activities.

During 2011, the insecticide endosulfan has been phased out of Cheminova's product programme. Endosulfan has never been produced by Cheminova but has been sold as third party product in few countries. The substance has been included in the Stockholm Convention list of persistent organic pollutants, and therefore it has to be phased out globally during a no more than five year period starting in 2012.

The following highlights the risk reducing activities in the developing countries Brazil and India where the last class I products were sold in 2010.

### Brazil

In Brazil, Cheminova's sales of methyl parathion in the form of WHO class I products have stopped and been replaced by less toxic insecticides, such as micro-encapsulated methyl parathion (WHO class II) used in the growing of soybeans and cotton at professional large-scale farms. Sales of this product



### Countrywise sales broken down by national income

*Sales of plant protection products broken down according to the World Bank categories of gross national income per capita. Source: World Development Indicators, database World Bank*

exclusively takes place in large packaging which are not attractive to small-scale farmers, and sales are limited to states where soybeans and cotton are grown by professional farmers.

Cheminova's Brazilian subsidiary is connected to a hotline open around the clock for reporting and first aid information in case of spillage and accidents.

In 2011, a series of 89 farmer and customer meetings with all together 4,394 participants were conducted. The meetings had a.o. focus on safe and correct use of plant protection products and personal protection equipment.

Cheminova's subsidiary has continued its partnership in the organisation inpEV whose purpose it is to promote proper disposal of used crop protection product containers. The organisation reports a more than 9% increase in the tonnage of containers collected in 2011. In addition to these activities projects among banana farmers have continued, see page 13.

#### India

The extensive safe use programme with training of dealers and farmers has been further expanded to include more than 350,000 persons in 2011. The programme also includes posters, video shows,

demonstrations and hand out of personal protection kits and first aid kits. The activities are carried out in collaboration with local authorities wherever possible. The programme is being continued while new CSR activities are focused on village projects described on page 10.

#### Other developing countries

In all other developing countries sales and marketing was in 2011 accompanied by safe use activities as mentioned under the four bullet points above. These activities are continued at the same level or higher despite the completed phase-out of the most toxic products. In future, the attention to avoid misuse or inappropriate product handling vs. FAO's Code of Conduct will be continued.

#### Follow-up on targets

**FAO's Code of Conduct:** FAO's Code of Conduct has been included in the general sales conditions applicable as of January 1, 2012. The sales conditions have been implemented by Cheminova A/S. The subsidiaries are in the process of translating to local languages and discussing adjustment to country specific requirements in the new sales conditions.

**Safe-use film:** The safe-use film has been improved and adjusted according to input from subsidiaries. Version 3.0 is now available on the Marketing Portal as well as on DVD. Furthermore, a special IT-version of the film is available to subsidiaries on inquiry, making it possible to adjust the sound recording and add speak and/or subtitles in local language. Subsidiaries are constantly encouraged to upload safe-use material to the Portal and during the year presentations, posters, film, etc. have been uploaded.

**Activities in Indian villages:** The CSR projects covering a variety of activities in several Indian villages have been successfully launched. Further information can be found in the article on page 10.

**Activities among small-scale banana producers in Brazil:** Along with education and training in safe use, the new application technology has been introduced and come into use by the farmers. The project in the state of Goiás is proceeding satisfactorily. Because of flooding in the project area in the state of São Paulo, the work with introduction of environmentally friendly control of fungi along streams has been delayed. See the article on page 13.

# Production

We are constantly working on improving environment, health and safety at all production sites.

Data on environment, health and safety for the above companies appear from the table on the next page. Well over half of the activities measured as turn-over of raw material takes place at the company in Denmark and almost 1/3 at the company in India. All producing companies are included in the statements for 2009, 2010 and 2011.

More detailed data for the production in Denmark (the green accounts) including historical data is available on the website of the Danish Environmental Protection Agency. The data have to be updated every year not later than May 31. ([http://www.mst.dk/NR/rdonlyres/DDF068A0-2986-46F6-86C5-096249DAD5B2/0/Cheminova\\_VVM\\_udvalgt.pdf](http://www.mst.dk/NR/rdonlyres/DDF068A0-2986-46F6-86C5-096249DAD5B2/0/Cheminova_VVM_udvalgt.pdf)).

Detailed information for the other companies included in the statement can also be found on [www.cheminova.com](http://www.cheminova.com). And so can the applied accounting principles.

The significant emissions of treated waste water take place from the production plants in Denmark and India where it is lead to the North Sea and Gulf of Khambhat, respectively.

On Cheminova's factory site in Denmark is an authorized waste deposit containing sulphur, sand and concrete contaminated with low concentrations of organophosphorous chemicals and mercury. The deposit is confined and does not constitute any danger to the



India (left): Seminar on plume reduction.  
United Kingdom (right): Production of micro nutrients.



## The Cheminova group owns the following production companies

Name	Production	Country	Location
Cheminova A/S	Chemical synthesis, formulation and filling	Denmark	Rønland, Lemvig
Cheminova India Ltd.	Chemical synthesis, formulation and filling	India	Panoli north of Mumbai
Stähler Deutschland GmbH & Co. KG	Formulation and filling	Germany	Stade west of Hamburg
Althaller Italia	Formulation and filling	Italy	San Colombano, south of Milano
Headland Agrochemicals Ltd.	Formulation and filling	United Kingdom	Deeside, North Wales
Cheminova MFG Pty. Ltd.	Formulation and filling	Australia	Wyong north of Sydney

surroundings. In 2010, Cheminova has entered into an agreement with the Danish Environmental Protection Agency to dismantle the deposit over a period of time. Dismantling of the deposit which will take place during a number of years will be initiated in 2012.

### Comments on the development from 2010 to 2011

The development from 2010 to 2011 is characterized by the fact that the production measured on consumption of raw materials has been reduced by 12% with large fluctuations from company to company. For instance the consumption of raw materials in Denmark has been reduced by 27% while in India it has increased by 36%. As the production in Denmark represents 53% of the total production the changes in Denmark result in essential changes of the reported figures. The consumption of raw materials expresses the volume of the production and therefore it has, all things being equal, an influence on all other parameters than accidents at work and absenteeism due to accidents.

**Note 1:** In 2010, consumption of natural gas has changed from 385 to 386 GWh. The change was caused by correction of an error in the statement.

**Note 2:** The emission of nitrogen with the waste water in Denmark has increased because of lower degree of treatment during the Christmas holidays.

**Note 3:** Several companies have increased the quantity of ordinary waste for recycling. Typically, we are dealing with iron and metal, corrugated cardboard and plastic.

**Note 4:** The heavy reduction in the quantity of ordinary waste for depositing is due to lower production and changed product mix in Denmark.

**Note 5:** The quantity of hazardous waste for recycling has increased significantly which is due to higher production, change of cleaning methods and change of classification of raw materials in the United Kingdom as well as changed product mix in Germany.

**Note 6:** Behind the increase in quantity of hazardous waste for incineration are large variations from company to company. Generally, changes in product mix is the primary reason for the increase.

**Note 7:** The quantity of hazardous waste for depositing is primarily due to the activities in India where we have succeeded in reducing the quantity of waste in spite of increased production.

**Note 8:** In 2011, all companies had fewer spillages than in 2010. In more companies, attitude and behaviour has been in focus in order to reduce the number of spillage.

**Note 9:** The largest reduction in number of accidents is seen in Denmark where in 2010 there were unusually many accidents at work. Frequency and



### Energy savings

98% of the energy consumption in the producing companies of the group takes place in Denmark and India where active ingredients for the plant protection products are manufactured by means of chemical synthesis which is very energy intensive. The main part of the electricity is produced with natural gas as primary energy source, the remainder is produced with oil as primary energy source. There is an ongoing process of energy optimization at the production plants in Denmark and India where the largest saving potential is. In the period 2009-2011 energy saving projects with a total effect of 29 GWh/year have been implemented.

### Fact box: Environment, health and safety

		Unit	Note	2011	2010	2009
Water consumption:	Cooling	Million m <sup>3</sup>		31	34	46
	Processes + ord. consump.	Thousand m <sup>3</sup>		682	821	885
Energy consumption:	Natural gas	GWh	1	337	386	447
	Electricity	GWh		67.2	76.9	79.9
	Fuel oil	GWh		2.7	1.8	16.3
Materials:	Raw material consumption	1000 tonnes		103	116	137
Discharge of waste water:	COD	Tonnes		206	289	154
	Nitrogen	Tonnes	2	31	16	19
	Phosphorus	Tonnes		9	9	11
Air emissions:	Particles	Tonnes		4.5	5.2	5.5
	CO <sub>2</sub>	1000 tonnes		71	79	106
Ordinary waste:	Recycling	1000 tonnes	3	3.7	3.3	3.3
	Incineration	1000 tonnes		0.47	0.47	1.11
	Depositing	1000 tonnes	4	15.8	21.1	34.2
Hazardous waste:	Recycling	Tonnes	5	579	145	486
	Incineration	1000 tonnes	6	7.4	6.8	14.4
	Depositing	1000 tonnes	7	2.28	2.39	2.44
Spillage		Number	8	19	70	35
Accidents		Number	9	20	34	15
Accident frequency		–	9	4.0	8.8	3.6
Absence from work due to accidents		–	10	0.9	3.6	3.2

absence is defined in the accounting principles

**Note 10:** Fewer and less serious accidents have resulted in a large reduction in absence from work due to accidents

### Follow-up on targets for 2011

In the following, the targets are stated with the degree to which they have been fulfilled.

#### India

- In 2011, the production in Technical Division will be certified in relation to ISO 14001 and OHSAS 18001.  
**Comment:** Certification accomplished mid-2011 as planned.
- Energy consumption at Technical Division to be reduced by 3% per produced volume in 2011.  
**Comment:** Energy consumption reduced by 36% per produced volume. The large reduction is due to an essentially higher production volume than originally planned together with a fall in energy consumption of 3.5%.
- Water consumption at Technical Division will in 2011 be reduced by 5% per produced volume.  
**Comment:** Water consumption reduced by 32% per produced volume. The large reduction is due to an essentially higher production volume than originally planned together with only 2% increase of water consumption.

- COD emission from Technical Division and intermediate plant will in 2011 be reduced by 5% per produced volume.  
**Comment:** COD emission was reduced by 8% per produced volume.

#### Denmark

- Certifying of the company's environmental management system in relation to ISO 14001 and OHSAS 18001 will be maintained in 2011.  
**Comment:** External audit was accomplished in September, and three minor nonconformities were corrected. Certificates have been maintained.
- In 2011, the energy consumption will continuously be optimized through retention of the certified energy management system according to DS/EN 16001 and compliance with the Danish Energy Agency's demands on energy management according to DS/EN 16001.  
**Comment:** External audit was accomplished in September, and one minor nonconformity was corrected. Certificate maintained.
- In order to achieve fewer accidents and errors at work a programme for education and training of employees' attitude and behaviour will be organized and accomplished.  
**Comment:** In May, about 80 employees with relation to the Health & Safety organisation were trained to take a dialogue with colleagues about

attitude and behaviour in connection with planning and completion of work. Since then further appr. 200 employees have been involved in the work.

#### Australia

- Absenteeism due to accidents at work will be reduced in 2011.  
**Comment:** There was no accident at work in 2011, but an accident in 2010 caused large absenteeism in 2011.
- Certifying according to ISO 14001 will be maintained in 2011.  
**Comment:** Audit accomplished in September with minor nonconformities which have been corrected.
- In 2011, the company's policy for safe behaviour will be updated, and training programmes for all employees will be accomplished.  
**Comment:** Accomplished as planned. Training accomplished by external supplier.
- The quantity of waste for recycling will be increased by 5%.  
**Comment:** Measured in absolute quantities, target has not been reached because of an essential fall in production and changed product mix. The part of waste for recycling has been reduced from 80.2% of the total quantity of waste in 2010 to 77.6% in 2011. Measured in relation to consumption of raw materials, quantity of waste for recycling has increased from 4% in 2010 to 9% in 2011.

# REACH – EU chemicals regulation

REACH – EU's chemicals regulation came into force on June 1, 2007. The registration work itself for the many chemicals has been divided into three phases of time. The first phase included chemicals which the companies produced or imported in quantities of more than 1,000 tonnes per year. This phase was completed at the end of 2010. Phase two, which we are in now, is running until the middle of 2013. It comprises chemicals which the companies produce or import in quantities of more than 100 tonnes per year.

During this period Cheminova expects to make 31 registrations. Ten of these are substances which

in REACH terminology are named "in place isolated intermediates" and 14 substances are named "transported isolated intermediates". For these stand that the data requirement is limited as the substances are handled only in closed systems and therefore are not spread in the environment. In addition, full registration of seven substances are expected. Five of these substances are so-called flotation agents used in the mining industry to separate metals from the ore when it has been crushed. These flotation agents are manufactured at Cheminova's factory in Denmark. The two additional substances are micro nutrients used as fertilizer and manufac-

tured at our subsidiary Headland in the United Kingdom.

As regards the substances which have been registered there is an on-going work preparing risk assessments for the different applications of the chemicals. These must be attached to the safety data sheet and forwarded to the customer in connection with deliveries of the product for any application.

Packagings with transport labels including warning symbols.



# Supplier management

Today, the supplier management is in principle fully integrated in Cheminova's purchasing policy, both at the parent company Cheminova A/S and at the subsidiaries.

Purchase at the parent company is organisationally divided in two departments. One department takes care of so-called ordinary purchasing managed by the Purchasing Department, the other is the Project Sourcing Department which deals with outsourcing of services rendered in the form of toll production of active ingredients for plant protection and toll production of formulation and packaging of active ingredients.

In the purchasing department our Supplier Code of Conduct is an integrated part of purchasing contracts, and

our purchasers are trained in making CSR screenings of potential new suppliers from a CSR point of view when visiting existing suppliers. At actual and formal audits of suppliers they are assisted by the Safety, Health, Environment & Quality department.

The Project Sourcing department has technical employees trained to handle all aspects of our CSR policy.

If we look at the supplier management work in the subsidiaries the CSR work in relation to ordinary purchasing is managed by the subsidiaries themselves in the countries where we have producing companies. In relation to services rendered in the form of primarily toll formulation and filling, the CSR work is coordinated by a technical responsible person who has in 2011 been appointed

in each region except for Region International where a person will be appointed in 2012.

In India, where we have a considerably larger organisation than in the other subsidiaries plus own manufacturing of active ingredients, the daily CSR work is fully handled locally by our Indian subsidiary.

In the departments at headquarters and in the subsidiaries, the CSR work takes place in close co-operation with the global Safety, Health, Environment & Quality department who is responsible for preparation of CSR policies and continuous training of staff in CSR themes. Furthermore, it is supervised that the company's own organisation is following the CSR policies.

In October 2011, representatives from Cheminova made a CSR audit at a supplier north to Shanghai in China.





# Human Resources

Continued activities on integration of our company values in the daily business promote job satisfaction as well as the strategic business goals.



## Mission, vision and values

Implementation of Cheminova's mission, vision and values has been an important focus area in 2011 and will continue to be so for the coming years. We have an important mission, which means that everyone in the organization, regardless of job, background, company, culture etc. has every right to be proud of making a contribution to improved living conditions for the world's population.

Our values have been discussed throughout the organization during the year, and we have collected good examples on how our values live in our daily activities everywhere in the organization. The true value of the company values plays out when they make a difference in our behavior. We have therefore communicated such examples globally. During the year we have compiled the best specific examples on the impact of the values on daily activities, and these are to be published as a leaflet. Editing of the leaflet has been completed and it will be published, at first in Danish and English, in 2012 to be distributed to all employees. In relation to distribution, we have set targets for how the leaflet shall be distributed and disseminated, see p. 31.

## Code of Business Principles and whistleblower function

Ensuring compliance with the accepted rules and regulations is essential for any organization. This is in particular a

challenge in a global organization with widely different cultures and the resulting differences in ways of interpretation of rules and regulations. A useful tool is an efficient and trustworthy whistleblower function, which is well-known to the entire organization. Cheminova's Code of Business Principles was updated in 2011 with a description of the new whistleblower function as an effort to make the function known throughout the organization. An updated leaflet with our Code of Business Principles and the new whistleblower function has been exposed widely to the entire organization.

The whistleblower function, which is managed by an independent external supplier, has proven to work as intended. The setup provides everyone with an opportunity to point at potential breaches to our Code of Business Principles, and it ensures everyone a respectful and competent treatment by the supplier. There have been two calls during 2011.

## Anti-corruption

Cheminova's Code of Business Principles have been distributed to all subsidiaries. The anti-corruption policy has been highlighted in subsidiaries in countries where the risk of corruption is considered high.

As a supplement to this we have with help from the accounting company PriceWaterhouseCoopers, who reviews

our CSR report, conducted a range of interviews with local staff from our operations in India, Mexico and Russia, and with selected collaborators in these countries. Part of the goal has been to get an update on the knowledge about our anti-corruption policy with our own employees and with our collaborators, and to ensure that anti-corruption is high on the agenda in our operations in these countries. The result of the survey is that the knowledge about our anti-corruption policy and the procedures in relation to this is generally satisfactory among our employees, but that improvement in certain areas is desirable. With respect to our business partners, the result is less clear cut, some have a good knowledge and some have a very limited knowledge. Another purpose of the survey activity was to ensure that anti-corruption is high on the agenda, and we expect improvement in situations where the knowledge is limited.

## Competence development

It is very important that we currently develop our skills and competences throughout the global organization. In this way we make sure that employees and managers are able to handle the tasks that follow from the strategic goals in a manner that is in compliance with our values and our Code of Business Principles.

A wide range of competence development activities for employees as well as

### Mission

We help improve quality of life for the world's population by supplying products that help farmers increase yields and quality of crops to satisfy the global demand for food, feed, fiber and energy.

### Vision

We create results for our customers by being a sustainable and innovative world-class supplier of a broad range of quality crop protection products. Value creation shall match the best among peer companies to the benefit of all stakeholders.

### Values

- We achieve ambitious goals
- We are innovative
- We decide and we act
- We recognize results
- We are good corporate citizens



In 2011, Cheminova was awarded with the "Apprenticeship Award of the Year" after nomination by the company's union representatives. The award was given for the special initiative for adult apprentices in the production department.

for managers was carried out in 2011 throughout the global organization. The activities included individual training courses as well as activities for departments, companies or management teams.

An example is a manager training day, which was arranged for all 130 managers with staff responsibility in the Danish organisation. The goal was to strengthen the competences of the individual manager in the process of making the Cheminova values come alive and be clear to the employees in their daily work. The managers were also trained in how to break down goals and KPIs for the individual department and support the development of a stronger performance culture.

In addition to the global initiatives to embed our mission, vision and values in our daily activities, the CSR initiatives have resulted in a number of separate activities, e.g. our subsidiary in United Kingdom had an initiative on prevention of cross contamination, and an internal training course on how communication and good management practice support the values and the Code of Business Principles was held at the production facility in Australia.

We have developed a talent/management training programme in collaboration with five other international companies. The programme is being tested in 2011/2012. The programme consists of five modules with concluding exams.

As a parallel activity, the participants receive individual coaching, and they carry out a strategic task for their company. The programme is designed to provide the best opportunity for personal development for the participants and at the same time provide the best possible contribution to the business. The programme will form a basis for further discussion of global initiatives with respect to the global HR Strategy, cf. action plan for 2012.

### Education awards

Cheminova's Danish operation received two education awards in 2011. "Apprenticeship Award of the Year" (Årets PraktikPladsPris) and a local "Apprentice of the Year" award (Årets lærling i Midt- og Vestjylland). The first mentioned award was presented to the management of the production facilities on June 8 based on a nomination from the union representatives at Cheminova. The background for rewarding Cheminova was the special initiative for adult apprentices in the production. 65 out of 224 employees are being trained. Ten percent of all process operators in Denmark have been trained at Cheminova. This is an impressive development, which was rewarded with the Apprenticeship Award of the Year.

Further a laboratory technician apprentice received the reward as the Apprentice of the Year in Mid-West Jutland.

### Follow-up on goals

The whistleblower function has been disseminated globally to all employees during 2011. Code of Business Principles with a description of the whistleblower function has been prepared in 13 languages and was distributed to all employees in the global organisation. The whistleblower function has also been exposed on the intranet in Denmark as well as in the global newsletter.

Mission, vision and values have been exposed during the year in the global newsletter, the intranet in Denmark and the employee magazine in Denmark. During the year we have compiled specific examples on the impact of the values on daily activities for the purpose of publication as a leaflet. Edition of the leaflet has been completed in 2011, and the leaflet will be published in 2012.

**Anti-corruption:** We have disseminated the anti-corruption policy through three subsidiaries in 2011: Activities in India included two sales offices and two suppliers, activities in Mexico included the subsidiary and two suppliers and activities in Russia included two sales offices and two suppliers.

# Action plan

## Village projects

Focus Area	Target/activity	Timetable	Success criteria
India	Extension of the "Aakash Ganga" water conservation project	2012	Further 25 hectares included in the project
	Continuation of the project "Saheli" on women empowerment on safety, health and livelihood	2012	Further five villages included in the project to cover totally nine villages
	Impact assessment of village projects to be expanded with two model villages	2012	Villages have been identified and assessment accomplished
Brazil: Development of village community based on environmentally friendly control of banana diseases	The project among small-scale banana farmers in the state of Goias will be continued	2012-13	Project keeps momentum, and focus on quality of the crop is established
	A project on community development plus safe and environmentally friendly control of plant diseases will be launched among small-scale banana farmers in an environmentally sensitive area in the state of São Paulo	2012	Project has been initiated

## 'Helping you grow – Chemistry with care'

Focus Area	Target/activity	Timetable	Success criteria
Chemistry with care	With selected years from the period 2000-2010 as baseline, an index will be prepared illustrating the area of farm land where the crops and thus the food production is protected by Cheminova's products	2012	An index based on controllable data is available
	With selected years from the period 2000-2010 as baseline, an index will be prepared illustrating the quantity of Cheminova plant protection products used per area unit	2012	An index based on controllable data is available
	With selected years from the period 2000-2010 as baseline, an index will be prepared illustrating selected, essential resources used by Cheminova to manufacture plant protection products compared to the area of farm land treated	2012	An index based on controllable data is available
	Development of at least 20 formulations with a low content of volatile organic solvents	2012-14	Recipes filed at Cheminova A/S or Cheminova's subsidiary in India
	Lower average toxicity of newly developed formulations measured through the classification of the formulation	2012-14	By each year the average WHO classification of newly developed formulations must be lower than the average classification of Cheminova's plant protection products. Only plant protection products, where the active ingredient is owned by Cheminova, are included

## Production

Focus Area	Target/activity	Timetable	Success criteria
India	Energy consumption for the production of three large products to be reduced by 3% per produced volume	2012	Total energy consumption for production of the products reduced by at least 3% per produced volume compared to 2011
	Frequency and seriousness of incidents and accidents at work to be reduced by 5%	2012	In each of the categories incidents at work (i.e. incidents without absenteeism after 48 hours) and accidents at work (i.e. accidents with absenteeism after 48 hours) both frequency and absenteeism have been reduced by 5% compared to 2011
	The production at the Intermediate Division to be certified in relation to ISO 14001 and OHSAS 18001	Mid-2013	Certification company has forwarded confirmation of certification



Focus Area	Target/activity	Timetable	Success criteria
Denmark	Re-certification of the company's environmental management system according to ISO 14001 and OHSAS 18001	2012-14	New certificates received in 2012. Retention of certificates in 2013-14
	Certification of the company's energy management system according to ISO 50001	2012-14	New certificate received in 2012. Retention of certificate in 2013-14
	Education and training of employees in better attitudes and safer behaviour according to the programme SAFE is spread to the global organisation	2012-13	At the end of 2012 at least 50% of all employees must be involved. In first half of 2013 all employees must be involved
	Quantity of hazardous waste from production of a fungicide to be reduced by half	2012	Quantity of hazardous waste measured in relation to the produced volume has been reduced by half. Reduction demonstrated in relation to average for 2009 and 2010
	Energy consumption for the production of an insecticide to be reduced by 8%	2012	Energy consumption in relation to produced volume has been reduced by at least 8% in relation to 2009
Australia	The water consumption in production cleaning processes will be minimized as part of the plant's water saving programme	2012	Investigation undertaken and associated action plan implemented
	It will be ensured that external contractors work in accordance with our demands on health, safety and environment	2012	Dissemination of a Contractor HSE Manual to 80% of the contractors regularly utilised by site

## REACH - EU chemicals regulation

Focus Area	Target/activity	Timetable	Success criteria
Chemical safety	Registration of the pre-registered substances that have to be registered before the end of 2013	2013	Receipts for the registrations received

## Supplier management

Focus Area	Target/activity	Timetable	Success criteria
Global organisation	In Region International, the supplier management will be rooted with a person with a technical background	2012	The person has been appointed and trained for the task

## Human Resources

Focus Area	Target/activity	Timetable	Success criteria
Mission, vision and values	Maintain knowledge of the company's mission, vision and values Activity: A leaflet with stories about the company's vision will be distributed to all employees of the group. The leaflet will be published in Danish and English at first	2012	The leaflet is available in Danish and English and has been communicated to all employees through the management
	Implementation of values to all employees in Denmark Activity: All managers have at meetings or other activities worked with implementation to the employees	2012	The meetings/activities have been conducted
	Accomplishment of an employee survey in the global organisation. The investigation will give a survey of the employees' knowledge of the company's knowledge. The survey may be part of another investigation	2013	Employee survey accomplished and reported. The employee survey is expected to show an improvement in relation to the above activity (implementation in Denmark in 2012)
Global HR strategy	Preparation of a global HR strategy to ensure increased and more structured focus on Human Resources in the group. The strategy will consist of elements which support Cheminova's business strategy up to 2015 and it is expected to be rolled out during the next years	2012	The strategy plan has been worked out with proposals of HR activities to be rolled out in the individual years up to 2015. The activities planned for 2012 have been accomplished

# Management statement



  
Kurt Pedersen Kaalund  
President & CEO



  
Anton Bro  
Senior Vice President,  
Development & Registration




  
Rico T. Christensen  
President,  
Region North America



  
Mats Edh  
President,  
Region International



  
Jaime Gomez-Arnau  
President,  
Region Europe



  
Niels Morten Hjort  
Senior Vice President,  
Production & Logistics




  
Jesper Barslynd Jacobsen  
Senior Vice President,  
Finance & Support



  
Berit Nørskou Pedersen  
Vice President,  
HR Development



  
Cesar Rojas  
President,  
Region Latin America



  
Jens Thorsen  
Vice President,  
Portfolio Management

On February 20, 2012, the company's top management, the Global Executive Committee (GEC), considered and approved the CSR report for 2011.

Cheminova's CSR work is founded on UN's Global Compact and GRI (Global Reporting Initiative) which are internationally approved codes together with Responsible Care which is the chemical industry's own code. Internally, The CSR work is rooted in Cheminova's Code of Business Principles and the practical application as described in a Global QC and CSR Manual.

GEC has the overall responsibility for Cheminova's subsidiaries and regions as well as all the company's other activities, including CSR.

It is GEC's view that the CSR report for 2011 provides an accurate picture of the company's CSR activities in the areas described.

# Assurance Statement

## Assurance Statement for Cheminova A/S's stakeholders from independent auditor

We have assessed Cheminova A/S's 2011 CSR Report for the purpose of expressing a conclusion on the descriptions of goal attainment and non-financial data contained in the Report as well as its capacity as Communication of Progress Report (COP Report) occasioned by Cheminova A/S's affiliation with the UN Global Compact.

### Criteria applied

The criteria for CSR-related goal attainment are stated in the 2010 CSR Report, in which goals as well as success criteria for the focus areas, Product Stewardship, Village Projects, Production, EU's New Chemical Policy, Supplier Management and Human resources, are presented.

The criteria for preparation of non-financial data contained in the CSR Report are evident from the accounting policies described on the company's website. These contain information concerning which of the Group's businesses and activities are included in the types of data reported as well as Management's reasons for selecting environmental and occupational health and safety data.

### Responsibilities

Cheminova A/S Management is responsible for preparing the CSR Report, including for setting up registration and internal control systems with a view to ensuring reliable reporting. Company Management is furthermore responsible for specifying acceptable reporting criteria as well as selecting data to be collected.

Moreover, Cheminova A/S Management is responsible for preparing a COP Report presenting Cheminova A/S's progress in respect of supporting the UN Global Compact sustainability principles.

Our responsibility is, on the basis of

our work, to express a conclusion on the information contained in the CSR Report regarding goal attainment and financial data as well as on the Report as a COP Report.

### Scope of our work

We planned and performed our work in accordance with the International Auditing Standard ISAE 3000 (assurance engagements other than audits or review of historical financial information) for the purpose of obtaining moderate assurance that

- the status of attainment of established CSR goals for 2011 on pages 6-7 is in accordance with the listed criteria for CSR goals, which were published in the 2010 CSR Report;
- the environmental and occupational health and safety data stated on page 25 have been recognised in accordance with the criteria stated for preparation of the non-financial data of the CSR Report;
- the CSR Report in its entirety is consistent with the Company's CSR activities and progress with a view to supporting the UN Global Compact.

The assurance obtained is limited as compared to that of an audit. Our work has therefore, based on an assessment of materiality and risk, primarily included inquiries concerning goal attainment, including on a judgemental sample-basis obtaining documented confirmations regarding goal attainment from local managements, interviews with selected key managerial employees responsible for the goal attainment and review of selected documentation.

Moreover, our interviews included the production sites companies in India and Denmark, and we paid visits to the subsidiaries sales companies in India and China.

The criteria stated concerning statement of environmental and occupational health and safety data, as described in the accounting policies, have primarily

been assessed from inquiries concerning procedures for calculation and measurement of the concrete data. Furthermore, we have performed technical accounting analyses of reported data and have reviewed selected documentation.

We have reviewed the Report with a view to assessing its informative value in relation to expectations for a COP Report. Through interviews with Management and selected key employees, we have gained insight into Management's commitment and status of embedding of the UN Global Compact and Cheminova A/S's values with relating specific activities.

We have noted the strategic management level of ambition and have on a sample basis tested the existence of local management awareness.

As agreed with Cheminova A/S Management, we have not performed any procedures relating to the reliability of the GRI reporting for 2011.

### Conclusion

Based on our review, nothing has come to our attention that causes us to believe that the descriptions covering the status of the attainment of CSR goals for 2011 on pages 6-7 are not accurate.

Furthermore, nothing has come to our attention that causes us to believe that the environmental and occupational health and safety data stated on page 25 have not been recognised in accordance with the criteria stated for preparation of the non-financial data of the CSR Report.

We confirm that the CSR Report serve as Cheminova A/S's COP Report, and based on the total work performed, nothing has come to our attention that causes us to believe that the CSR Report in its entirety is not based on specific activities and thus Cheminova A/S's progress with a view to supporting the UN Global Compact.

Copenhagen, March 12, 2012

**PricewaterhouseCoopers**

Statsautoriseret Revisionsaktieselskab



Birgitte Mogensen  
State Authorised Public Accountant



Jens Pultz Pedersen  
MSc (Engineering), Diploma  
(Business Economics)



# GRI reporting 2011

The page numbers refer to the relevant sections of this report, and AR refers to page numbers in Auriga's Annual Report 2011.

F = Fully reported; P = Partially reported.



Information about the company	Links and comments		Page
<b>1. Strategy and analysis</b>			
1.1 Statement from the president, CEO and the Global Executive Committee	<a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a>	F	3 and 32
1.2 Description of essential impacts, risks and opportunities	<a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a> - AR 2011 p. 14	F	16 and 19
<b>2. Organisational profile</b>			
2.1 Name of the organization	-	F	1
2.2 Primary brands, products, and/or services	<a href="http://www.cheminova.com/en/products__innovation/products__innovation.htm">http://www.cheminova.com/en/products__innovation/products__innovation.htm</a>	F	9
2.3 Operational structure of the organization, including main divisions, operating companies, subsidiaries, and joint ventures	<a href="http://www.auriga.dk/en/auriga_industries/corporate_structure/">http://www.auriga.dk/en/auriga_industries/corporate_structure/</a>	F	-
2.4 Location of organization's headquarters	-	F	44
2.5 Number of countries where the organization operates, and names of countries with either major operations or that are specifically relevant to the sustainability issues covered in the report	<a href="http://www.auriga.dk/en/auriga_industries/corporate_structure/">http://www.auriga.dk/en/auriga_industries/corporate_structure/</a>	F	-
2.6 Nature of ownership and legal form	<a href="http://www.auriga.dk/en/investor_relations/share_information/share_capital.htm">http://www.auriga.dk/en/investor_relations/share_information/share_capital.htm</a>	F	-
2.7 Markets served	<a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a>	F	22
2.8 Scale of the reporting organization	<a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a> AR2011 p. 4 + notes p. 34-55	F	-
2.9 Significant changes during the reporting period regarding size, structure, or ownership	<a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a>	F	4
2.10 Awards received in the reporting period	-	F	29
<b>3. Report parameters</b>			
<i>Aspect: Report profile</i>			
3.1 Reporting period for information provided	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm</a>	F	-
3.2 Date of most recent previous report	March 29, 2011	F	-
3.3 Reporting cycle	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm</a>	F	-
3.4 Contact point for questions regarding the report or its contents	-	F	2
<i>Report scope and boundary</i>			
3.5 Process for defining report content	-	F	4
3.6 Boundary of the report	-	F	4
3.7 Limitations on the scope or boundary of the report.	-	F	4
3.8 Basis for reporting on joint ventures, subsidiaries, leased facilities, outsourced operations, and other entities that can significantly affect comparability from period to period and/or between organizations	n.a.	F	-
3.9 Data measurement techniques and the bases of calculations, including assumptions and techniques underlying estimations applied to the compilation of the indicators and other information in the report	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a> <a href="http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm</a>	F	-

Information about the company		Links and comments		Page	
3.10	Explanation of the effect of any re-statements of information provided in earlier reports, and the reasons for such re-statement	n.a.	F	-	
3.11	Significant changes from previous reporting periods in the scope, boundary, or measurement methods applied in the report	n.a.	F	-	
3.12	Table identifying the location of the Standard Disclosures in the report	-	F	34	
3.13	Verification	-	F	33 and 34	
<b>4. Governance, commitments and engagement</b>					
<i>Aspect: Governance</i>					
4.1	Governance structure of the organization, including committees under the highest governance body responsible for specific tasks, such as setting strategy or organizational oversight	<a href="http://www.auriga.dk/en/auriga_industries/management_02/board_of_directors.htm">http://www.auriga.dk/en/auriga_industries/management_02/board_of_directors.htm</a> <a href="http://www.auriga.dk/en/auriga_industries/management_02/executive_board.htm">http://www.auriga.dk/en/auriga_industries/management_02/executive_board.htm</a>	F	35	
4.2	Indicate whether the Chair of the highest governance body is also an executive officer	<a href="http://www.auriga.dk/en/auriga_industries/management_02/board_of_directors.htm">http://www.auriga.dk/en/auriga_industries/management_02/board_of_directors.htm</a> <a href="http://www.auriga.dk/en/auriga_industries/management_02/executive_board.htm">http://www.auriga.dk/en/auriga_industries/management_02/executive_board.htm</a>	F	-	
4.3	For organizations that have a unitary board structure, state the number of members of the highest governance body that are independent and/or non-executive members	<a href="http://www.auriga.dk/en/auriga_industries/management_02/board_of_directors.htm">http://www.auriga.dk/en/auriga_industries/management_02/board_of_directors.htm</a> <a href="http://www.auriga.dk/en/auriga_industries/management_02/executive_board.htm">http://www.auriga.dk/en/auriga_industries/management_02/executive_board.htm</a>	F	-	
4.4	Mechanisms for shareholders and employees to provide recommendations or direction to the highest governance body	-	F	5	
4.5	Linkage between compensation for members of the highest governance body, senior managers, and executives (including departure arrangements) and the organisation's performance (including social and environmental performance)	<a href="http://www.auriga.dk/download/generalforsamling/2011/remuneration_policy_2011.pdf">http://www.auriga.dk/download/generalforsamling/2011/remuneration_policy_2011.pdf</a> <a href="http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm">http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm</a>	F	-	
4.6	Processes in place for the highest governance body to ensure conflicts of interest are avoided	<a href="http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm">http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm</a>	F	-	
4.7	Process for determining the qualifications and expertise of the members of the highest governance body for guiding the organisation's strategy on economic, environmental, and social topics	<a href="http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm">http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm</a>	F	-	
4.8	Internally developed statements of vision, values, principles etc. and their implementation	<a href="http://www.auriga.dk/en/auriga_industries/mission_and_vision/http://www.cheminova.com/en/sustainability/code_of_conduct/code_of_business_principles.htm">http://www.auriga.dk/en/auriga_industries/mission_and_vision/http://www.cheminova.com/en/sustainability/code_of_conduct/code_of_business_principles.htm</a> <a href="http://www.cheminova.com/en/sustainability/code_of_conduct/supplier_code_of_conduct.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/supplier_code_of_conduct.htm</a>	F	28	
4.9	Procedures of the Board for overseeing the organisation's economic, environmental and social management and performance	<a href="http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm">http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm</a> <a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a> - AR 2011 p. 15	F	-	
4.10	Processes for evaluating the Boards own performance	<a href="http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm">http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm</a> <a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a> - AR 2011 p. 15	F	-	
<i>Aspect: Commitments to external initiatives</i>					
4.11	Explanation of whether and how the precautionary approach or principle is addressed by the organisation	-	F	3, 14, 16 and 22	
4.12	Externally developed economic, environmental, and social charters, principles, or other initiatives to which the organisation subscribes or endorses	-	F	38 and 42	
4.13	Memberships in associations	-	F	9	
<i>Aspect: Stakeholder engagement</i>					
4.14	List of stakeholder groups engaged by the organizations	-	F	5	
4.15	Basis for identification and selection of stakeholders with whom to engage	-	F	5	
4.16	Approaches to stakeholder engagement, including frequency of engagement by type and by stakeholder group	There is a current and open dialog with our stakeholders	F	5	

## GRI reporting 2011, continued

Information about the company		Links and comments	Page	
4.17	Key topics and concerns that have been raised through stakeholder engagement, and how the organisation has responded	<a href="http://www.mst.dk/NR/rdonlyres/DDF068A0-2986-46F6-86C5-096249DAD5B2/0/Cheminova_VVM_udvidelse.pdf">http://www.mst.dk/NR/rdonlyres/DDF068A0-2986-46F6-86C5-096249DAD5B2/0/Cheminova_VVM_udvidelse.pdf</a> Climate change and potential harm from plant protection products are focus areas among our stakeholders	F	16 and 18

Indicators of company's CSR		Links and comments	Page	
Economics				
	Management approach		F	-
Aspect: Economic performance				
EC1	Direct economic value generated and distributed, including revenues, operating costs, employee compensation, donations and other community investments, retained earnings, and payments to capital providers and governments	<a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a> - AR 2011 p. 4 and 34-55	F	-
EC3	Coverage of the organization's defined benefit plan obligations	<a href="http://www.auriga.dk/en/finance/annual_reports/">http://www.auriga.dk/en/finance/annual_reports/</a> - AR 2011 p. 46-47 <a href="http://www.auriga.dk/download/generalforsamling/2011/remuneration_policy_2011.pdf">http://www.auriga.dk/download/generalforsamling/2011/remuneration_policy_2011.pdf</a>	F	-
Aspect: Market presence				
EC7	Procedures for local hiring and proportion of senior management hired from the local community at locations of significant operation	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm</a>	F	-
Environemnt				
	Management approach	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	-
Aspect: Materials				
EN1	Materials used by weight or volume	-	F	25
Aspect: Energy				
EN3	Direct energy consumption by primary energy source	-	F	25
EN4	Indirect energy consumption by primary source	-	F	25
Aspect: Water				
EN8	Total water withdrawal by source	-	F	25
Aspect: Biodiversity				
EN11	Location and size of land owned, leased, managed in, or adjacent to, protected areas and areas of high biodiversity value outside protected areas	<a href="http://www.cheminova.com/en/sustainability/related_articles/production_sites_and_natural_resorts.htm">http://www.cheminova.com/en/sustainability/related_articles/production_sites_and_natural_resorts.htm</a>	F	19
EN12	Description of significant impacts of activities, products, and services on biodiversity in protected areas and areas of high biodiversity value outside protected areas	<a href="http://www.cheminova.com/en/sustainability/related_articles/production_sites_and_natural_resorts.htm">http://www.cheminova.com/en/sustainability/related_articles/production_sites_and_natural_resorts.htm</a>	F	19
Aspect: Emissions, effluents and water				
EN16	Total direct and indirect greenhouse gas emissions by weight	-	F	25
EN21	Total water discharge by quality and destination	-	F	25
EN22	Total weight of waste by type and disposal method	-	F	25
EN23	Total number and volume of significant spills	-	P	25
Aspect: Products and services				
EN26	Initiatives to mitigate environmental impacts of products and services, and extent of impact mitigation	<a href="http://www.cheminova.com/en/about_us/understanding_cheminova/safety_and_health.htm">http://www.cheminova.com/en/about_us/understanding_cheminova/safety_and_health.htm</a>	F	16 and 22

Indicators of company's CSR		Links and comments	Page	
Labour practices and decent work				
	Management approach	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	5
Aspect: Occupational health and safety				
LA7	Rates of injury, occupational diseases, lost days, and absenteeism, and number of work-related facilities by region	Only for the manufacturing companies	P	25
LA8	Education, training, counselling, prevention, and risk-control programmes in place to assist workforce members, their families, or community members regarding serious diseases	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm</a>	F	
Human rights				
	Management approach	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	-
Aspect: Freedom of association and collective bargaining				
HR5	Operations identified in which the right to exercise freedom of association and collective bargaining may be at significant risk, and actions taken to support these rights	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm</a> <a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	-
Aspect: Child labour				
HR6	Operations identified as having significant risk for incidents of child labour, and measures taken to contribute to the elimination of child labour	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm</a> <a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	-
Aspect: Forced and compulsory labour				
HR7	Operations identified as having significant risk for incidents of forced or compulsory labour, and measures to contribute to the elimination of forced or compulsory labour	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/labour_practices.htm</a> <a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	
Society				
	Management approach	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	42
Aspect: Community				
SO1	Impacts of operations on communities, including entering, operating, and exiting	-	F	5
Aspect: Corruption				
SO3	Percentage of employees trained in organisation's anti-corruption policies and procedures	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	P	-
Aspect: Public policy				
SO5	Public policy positions and participation in public policy development and lobbying	-	F	5
Product responsibility				
	Management approach	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>	F	42
Aspect: Customer health and safety				
PR1	Life cycle stages in which health and safety impacts of products and services are assessed for improvement, and percentage of significant products and services categories subject to such procedures	<a href="http://www.cheminova.com/en/about_us/understanding_cheminova/safety_and_health.htm">http://www.cheminova.com/en/about_us/understanding_cheminova/safety_and_health.htm</a>	F	-
Aspect: Product and service labelling				
PR3	Type of product and service information required by procedures, and percentage of significant products and services subject to such information requirements	<a href="http://www.cheminova.com/en/about_us/understanding_cheminova/safety_and_health.htm">http://www.cheminova.com/en/about_us/understanding_cheminova/safety_and_health.htm</a> Covering all plant protection products	F	16



# UN Global Compact

Progress report on the implementation of the principles of the UN Global Compact

Cheminova has supported the United Nations Global Compact since 2009. We support the endeavors to make globalization more socially and ecologically compatible and to raise standards in the fields of human rights, labour rights and environmental protection and in the fight against corruption. The following table shows the activities and management systems at Cheminova that support the 10 principles of the Global Compact and the results which were achieved in the period under review. Information on the Global Compact can be found at [www.unglobalcompact.org](http://www.unglobalcompact.org).

Systems	Measures 2011	Achievements 2011
<b>Human Rights:</b>		
Principle 1: Support of human rights		
Principle 2: Exclusion of human rights violations		
<ul style="list-style-type: none"> <li>• Code of Business principles (p. 42)</li> <li>• Supplier Code of Conduct (p. 42)</li> <li>• CSR management of suppliers and toll producers (p. 42)</li> <li>• Human Rights Position (p. 42)</li> </ul>	<ul style="list-style-type: none"> <li>• In 2011, the knowledge of the company's mission, vision and values will be spread and maintained among all employees of the group</li> <li>• In 2011, the knowledge of the whistleblower function will be spread to all employees of the global organisation</li> <li>• The project "Saheli" on women empowerment on safety, health and livelihood will be initiated in four villages in India in 2011</li> </ul>	<ul style="list-style-type: none"> <li>• Executed (p. 7)</li> <li>• Executed (p. 7)</li> <li>• Executed (p. 8)</li> </ul>
<b>Labour Standards:</b>		
Principle 3: Observance of the right to freedom of association		
Principle 4: Abolition of all forms of forced labour		
Principle 5: Abolition of child labour		
Principle 6: Elimination of discrimination		
<ul style="list-style-type: none"> <li>• Code of Business Principles (p. 42)</li> <li>• Supplier Code of Conduct (p. 42)</li> <li>• CSR management of suppliers and toll producers (p. 42)</li> <li>• Labour Protection Position (p. 42)</li> <li>• FAO's Code of Conduct (p. 42)</li> <li>• HSEQ management systems (p. 42)</li> </ul>	<ul style="list-style-type: none"> <li>• In 2011, the knowledge of the company's mission, vision and values will be spread and maintained among the employees of the group</li> <li>• In 2011, FAO's Code of Conduct shall be included as a part of the general sales conditions. Compliance with FAO's Code of Conduct will be an integrated part of Cheminova's general sales conditions</li> <li>• The modular films with safety instructions will be extended to more countries and markets. In 2011, these films will be available for Cheminova's marketing and CSR employees</li> <li>• Production at the Technical Division in India will in 2011 be certified in relation to OHSAS 18001</li> </ul>	<ul style="list-style-type: none"> <li>• Executed (p. 7)</li> <li>• Executed (p. 8)</li> <li>• Executed (p. 6)</li> <li>• Executed (p. 6)</li> </ul>
<b>Environment:</b>		
Principle 7: Precautionary environmental protection		
Principle 8: Specific commitment to environmental protection		
Principle 9: Diffusion of environmentally friendly technologies		
<ul style="list-style-type: none"> <li>• Code of Business Principles (p. 42)</li> <li>• Responsible Care (p. 42)</li> <li>• Supplier Code of Conduct (p. 42)</li> <li>• HSEQ management systems (p. 42)</li> <li>• CSR management of suppliers and toll producers (p. 42)</li> <li>• FAO's Code of Conduct (p. 42)</li> </ul>	<ul style="list-style-type: none"> <li>• In India, the project "Aakash Ganga" on water conservation will be initiated in 2011</li> <li>• The project among small-scale banana farmers in the state of Goias in Brazil will be continued in 2011-12</li> <li>• A new project on community development and safe and environmentally friendly control of plant diseases will be launched among small-scale banana farmers in the state of São Paulo in Brazil in 2011.</li> <li>• The production at the Technical Division in India will in 2011 be certified in relation to ISO 14001</li> <li>• The energy consumption at Technical Division in India will in 2011 be reduced by 3% per produced volume</li> <li>• The water consumption at the Technical Division and the intermediate plant in India will in 2011 be reduced by 5% per produced volume</li> <li>• The COD emission from the Technical Division and the intermediate plant in India will in 2011 be reduced by 5% per produced volume</li> </ul>	<ul style="list-style-type: none"> <li>• Executed (p. 6)</li> <li>• Executed (p. 6)</li> <li>• Implementation plan is followed (p. 6)</li> <li>• Executed (p. 6)</li> <li>• Executed (p. 6)</li> <li>• Executed (p. 6)</li> <li>• Executed (p. 6)</li> </ul>

Systems	Measures 2011	Achievements 2011
<b>Anti-corruption</b>		
Principle 10: Measures to fight corruption		
<ul style="list-style-type: none"> <li>• Code of Business Principles (p. 42)</li> <li>• Anti-corruption Position (p. 42)</li> <li>• Supplier Code of Conduct (p. 42)</li> <li>• CSR management of suppliers and toll producers (p. 42)</li> </ul>	<ul style="list-style-type: none"> <li>• In 2011, the knowledge of the whistleblower function will be spread to all employees of the global organisation</li> <li>• In 2011, communication of the company's anti-corruption policy will be accomplished in selected subsidiaries</li> </ul>	<ul style="list-style-type: none"> <li>• Executed (p. 7)</li> <li>• Executed (p. 7)</li> </ul>
<b>General CSR issues</b>		
<ul style="list-style-type: none"> <li>• Code of Business Principles (p. 42)</li> <li>• Responsible Care (p. 42)</li> <li>• FAO's Code of Conduct (p. 42)</li> </ul>	<ul style="list-style-type: none"> <li>• The already initiated projects in the nine selected villages in India will be continued in 2011 and 2012</li> <li>• Impact assessments and implementation of specific improvements identified will be undertaken in two villages in India</li> </ul>	<ul style="list-style-type: none"> <li>• Plan is followed (p. 6)</li> <li>• Plan is followed (p. 6)</li> </ul>

# Glossary

**Active ingredient:**

Active chemical in its pure or technical form.

**Auditing:**

Review of accounts.

**BNP:**

GDP (Gross Domestic Product).

**Chemical synthesis:**

Process, where chemical compounds react with each other so that new compounds are formed.

**Class I product:**

A product, which according to WHO's recommended guidelines is classified as highly hazardous or extremely hazardous.

**CLP:**

Classification, Labelling and Packaging. The CLP Regulation ensures that the hazards presented by chemicals are clearly communicated to workers and consumers in the European Union through classification and labelling of chemicals.

**COD:**

Chemical Oxygen Demand - measure for the content of organic compounds in water.

**CSR:**

Corporate Social Responsibility. Social, environmental and ethical demands made between companies, customers, interested parties and collaboration partners.

**Emulsifiable concentrate:**

Mixture of a liquid active ingredient, solvents and surfactants that enable the product to be diluted with water to a low concentrate spray fluid.

**FAO:**

The UN's Food and Agriculture Organisation.

**FAO's Code of Conduct:**

FAO's international guidelines concerning the distribution and use of pesticides.

**Fenamiphos:**

Insecticide used against soil-living pests (nematodes).

**Formulation:**

Active ingredient to which has been added accessory agents that make the product ready-to-use as control agent.

**Fossil fuel:**

Coal, oil and gas.

**GC:**

Gas Chromatography - a common type of chromatography used in analytical chemistry for separating and analysing compounds that can be vaporized without decomposition.

**GDP:**

Gross Domestic Product.

**GEC:**

Global Executive Committee. Cheminova's top management group.

**Global Compact:**

A UN initiative giving ten general principles for companies' work with corporate social responsibility

**GRI:**

Global Reporting Initiative with guidelines for reporting on CSR.

**HPLC:**

High-performance liquid chromatography - a very common analysis method of chemical compounds.

**ISO 14001:**

International environmental certification covering the surrounding environment.

**KPI:**

Key Performance Indicator.

**Low VOC:**

Low Volatile Organic Compound, defined as maximum 20% evaporation at 115°C in 60 minutes cf. Estimation of Volatile Emission Potential of Pesticides by Thermogravimetry, California Department of Pesticide Regulation, February 9, 2005.

**Marketing Portal:**

An internal website with useful information concerning marketing.

**Methomyl:**

Insecticide, in Mexico mostly used in cotton and vegetables.

**Methyl parathion:**

Insecticide mostly used in cotton.

**Microcapsules (microcapsule formulation):**

Fluid product where the active ingredient is encapsulated in microscopic capsules which are dispersed in water.

**Nm³:**

Normal cubicmeter (volume at standard pressure and temperature).

**OHSAS 18001:**

International environmental certification covering the working environment.

**Omethoate:**

Insecticide among others used to control mites in Australia.

**Pesticides (plant protection products):**

Collective name for insecticides, herbicides and fungicides.

**PIC:**

Prior Informed Consent (Prior informed consent that has to be established before a product from the PIC list is exported).

**Product stewardship:**

Overall description of responsible management of a company's products.

**Ramsar areas:**

Wetlands where wildlife is protected according to the convention of wetlands of international importance, particularly as habitats for birds.

**REACH:**

Registration, Evaluation and Authorisation of Chemicals (Common EU regulation on documentation requirements concerning chemicals).

**Registration data:**

Test results and documentation that must be submitted to the authorities in order to obtain sales permissions.

**Responsible Care:**

Objectives concerning responsible conduct, adhered to by Cheminova.

**SAFE:**

Safe Attitude (behaviour) For Everybody.

**Saheli:**

Saheli is formed taking the first two letters from each of the three core areas Safety, Health and Livelihood.

**Suspension concentrate:**

An active ingredient in solid form suspended in water with surfactants which enables the product to be diluted with water to a low concentrate spray liquid.

**Third-party products:**

Sales products not produced by Cheminova but bought from other suppliers.

**WHO:**

World Health Organisation.



## Statement GRI Application Level Check

GRI hereby states that **Cheminova A/S** has presented its report "Corporate Social Responsibility Report 2011" to GRI's Report Services which have concluded that the report fulfils the requirement of Application Level B.

GRI Application Levels communicate the extent to which the content of the G3 Guidelines has been used in the submitted sustainability reporting. The Check confirms that the required set and number of disclosures for that Application Level have been addressed in the reporting and that the GRI Content Index demonstrates a valid representation of the required disclosures, as described in the GRI G3 Guidelines.

Application Levels do not provide an opinion on the sustainability performance of the reporter nor the quality of the information in the report.

Amsterdam, March 9th 2012

Nelmaria Arbex  
Deputy Chief Executive  
Global Reporting Initiative



The Global Reporting Initiative (GRI) is a network-based organisation that has pioneered the development of the world's most widely used sustainability reporting framework and is committed to its continuous improvement and application worldwide. The GRI Guidelines set out the principles and indicators that organisations can use to measure and report their economic, environmental, and social performance. [www.globalreporting.org](http://www.globalreporting.org)

**Disclaimer:** Where the relevant sustainability reporting includes external links, including to audio visual material, this statement only concerns material submitted to GRI at the time of the Check on March 2nd 2012. GRI explicitly excludes the statement being applied to any later changes to such material.



# Special references

Previous CSR reports have included a number of appendixes in full length. This year we have decided to publish some of these appendixes only on Cheminova's website. Below is shown where these documents can be found.

Reference	Explanation	Where to find it
Ownership and organisation 	An overview of Cheminova's global organisation, regions, ownership and anchoring of CSR in the organisation	<a href="http://www.cheminova.com/en/about_us/management_and_structure/corporate_structure.htm">http://www.cheminova.com/en/about_us/management_and_structure/corporate_structure.htm</a>
Responsible Care 	The European Chemical Industry Council's (CEFIC) Responsible Care programme for continuous improvement within safety, health and environment	<a href="http://www.cheminova.com/en/sustainability/production/responsible_care.htm">http://www.cheminova.com/en/sustainability/production/responsible_care.htm</a>
Code of Business Principles 	A description of the company's Code of Business Principles which must be complied with by all employees and which support responsibility in relation to management, cooperation and society	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/code_of_business_principles.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/code_of_business_principles.htm</a>
Principles for Code of Conduct for suppliers 	The fundamental principles which Cheminova's suppliers have to comply with	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/supplier_code_of_conduct.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/supplier_code_of_conduct.htm</a>
CSR Accounting Principles 	The principles for data collection on environment, safety and health	<a href="http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm">http://www.cheminova.com/en/sustainability/data_and_summaries/accounting_policies_csr.htm</a>
FAO's Code of Conduct 	Voluntary international standards of responsibility and behaviour concerning distribution and use of pesticides	<a href="http://www.fao.org/ag/magazine/mso35C.pdf">http://www.fao.org/ag/magazine/mso35C.pdf</a>
FN's Millennium Development Goals 	UN's 8 goals for reduction of poverty before 2015	<a href="http://www.un.org/millenniumgoals/">http://www.un.org/millenniumgoals/</a>
Management approach to CSR Management 	Summary of principles and procedures on CSR management	<a href="http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm">http://www.cheminova.com/en/sustainability/code_of_conduct/management_approach_to_csr_management.htm</a>
Principles for good corporate management 	The statutory report on Corporate Governance 2011 – comments on recommendation on good corporate management	<a href="http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm">http://www.auriga.dk/en/auriga_industries/corporate_governance/report_on_corporate_governance.htm</a>



