Convention on Biological Diversity

Fourth National Report of the Netherlands

April 2010
Ministry of Agriculture, Nature and Food Quality
Department of Nature, Landscape and Rural Affairs
The Hague, the Netherlands

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Contents

Executive summary

General developments in the Netherlands regarding biodiversity and policy
The Netherlands is among the most densely populated countries. In addition, the majority of its terrestrial area is covered by highly productive agricultural lands and pristine ecosystems are currently virtually absent in the Netherlands. Consequently, when taking the early 20th century as a reference for the state of current biodiversity in this country, as is the case in some indicators in external evaluations of Dutch domestic nature policy, a relative unfavourable picture might emerge.

Nonetheless, ecological processes inevitably still do occur in the Netherlands, and, for example, animal species composition has not changed dramatically over the 20th century (Koomen *et al.* 1995). Furthermore, the Netherlands has spent much effort in safeguarding and restoring existing nature as well as in creating "new" nature. This has to result in the realization of a sound National Ecological Network (NEN) by around 2018. The NEN will also include many areas of particular importance that have been designated under the EU Birds Directive and Habitats Directive. Since 1990, realization of the NEN is the backbone of Dutch domestic nature policy and it provides new ecological opportunities for "old" species resulting in areas with high nature values. As such, the corresponding targets are in line with several CBD targets on protected areas. The NEN areas also increasingly represent a variety of economic values, for example, when taking important ecosystem services, including recreational opportunities into account. Further, current biodiversity policy also addresses an advise of the so-called *Deltacommissie* to combine nature and water management efforts for the sake of climate adaptation.

The Netherlands has also a sophisticated level of collecting and processing biodiversity data. Due to this, the Netherlands is amongst the nations with the first and most comprehensive online national species catalogues. In 2010, the Netherlands Centre for Biodiversity Naturalis has also been launched. This centre combines the efforts of several Dutch taxonomic institutes. Further, the Netherlands has also published a relative large number of national red lists. Although the lists do reflect unfavourable trends regarding species, they also show a high level of knowledge about the national biodiversity, particularly among thousands of volunteers participating in nature survey NGOs (*Particuliere Gegevensbeherende Organisaties*).

Further, regarding biodiversity outside the Netherlands, the Dutch government also spends substantial amounts of development assistance on initiatives contributing to the sustainable use of biodiversity.

Nonetheless, even compared to more recent references (e.g., 1950 or 1982), many species populations in the Netherlands have declined or are further declining. Factors considered to have contributed to the long-term decline (i.e., over the 20th century) of populations of animal species include large-scale hydraulic works, organic pollution and salinization, the disappearance of eelgrass beds in the Wadden Sea, straightening of water coarses, reclaiming of heathlands and grasslands as well as the subsequent acidification, eutrophication and desiccation of these lands, and the disappearance of flowery areas (Koomen *et al.* 1995). Factors considered to have been involved in the long-term decline (i.e., over the 20th century) of plant species (including lichens, algae and macrofungi) include air pollution, nitrogen deposition, habitat destruction (including of heathlands, grasslands, moors and dunes), the disappearance of eelgrass beds in the Wadden Sea, increased water temperatures, acidification and eutrophication of waters, and decreased vitality of forests (Van der Meijden *et al.* 1995).

Particularly during the late sixties and seventies, societal and political concern with environmental issues has grown and the Netherlands has developed a considerable body of spatial, environmental and nature legislation and policy since then. Part of the legislation and policy aims at implementing international treaties, such as the CBD, and EU regulations. In short, the variety of measures has had inhibiting effects on

biodiversity decline, although several targets, notably regarding the realization of the NEN and the reduction of nitrogen emissions and depositions, still remain challenging, including with reference to CBD targets.

In addition, concern with biodiversity outside the Netherlands has increased and corresponding policy focuses on realizing more sustainable international trade and production chains to facilitate the integration of social and ecological conditions and promote the production and trade of sustainable products. The Netherlands also stimulates the development of financial mechanisms that assign economic values to ecosystem services, which also contributes to ecosystem preservation.

Another challenge is enhancing public awareness and concern regarding biodiversity. To meet this challenge, current biodiversity policy increasingly emphasizes functional values of biodiversity rather than expressing the more traditional concern about the conservation status of individual species.

Although not for all CBD targets and issues information could be provided in the present report, including on policy efforts and progress, our overall impression is that at least the various policy efforts in the Netherlands may be regarded as being to a large extent in line with the various actions of the CBD and COP decisions. The remainder of this summary provides an overview of the content of the present report for each chapter separately.

Chapter I: Overview of biodiversity: status, trends and threats

Section 1.1 and 1.2 in this chapter present several key data and data sources regarding the status and trends of Dutch biodiversity. The sources include the Dutch Species Catalogue, a comprehensive online species list of all recorded multi-cellular species in the Netherlands. The database also provides information on the legal and red list status and on recent population trend data for the species concerned. In addition, the chapter presents various sources for spatial data including on nature areas. Further, several trend data provided by the Netherlands Environmental Assessment Agency are presented.

Finally, section 1.3 provides a concise overview of factors involved in the long-term decline in populations of animal and plant species during the 20th century (see also above).

Chapter II: Current status of national biodiversity strategies and action plans

Section 2.1 in this chapter lists relevant policy plans on biodiversity since 1995 and various corresponding internet links, preferably to English versions. The plans referred to include the most recent document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" and an additional policy note on invasive alien species. Section 2.2 indicates where targets and indicators adopted under the CBD have been incorporated into national policy or legislation. To this end, various articles, thematic programmes and cross-cutting issues of the CBD are listed. For each article, thematic programme and cross-cutting issue, a brief reference is given to where principles according to CBD targets have been addressed and, where appropriate, some corresponding indicators. Section 2.4 refers to a number of sources in which progress in Dutch biodiversity has been evaluated, such as the yearly reports "Nature balance" of the Netherlands Environmental Assessment Agency. Section 2.5 refers to sources indicating public spending of the Netherlands on biodiversity policy. Section 2.6 and 2.7 address obstacles encountered in and effectiveness of Dutch biodiversity policy and again refers to various sources including the "Nature balance". In section 2.8 specific information requested in COP 8 decisions is provided.

Chapter III: Sectoral and cross-sectoral integration or mainstreaming of biodiversity considerations

Section 3.1 of this chapter indicates for the policy domains agriculture, education, health, rural development, forestry, fishery, mining, tourism, finance, trade, and industry, whether and where the Netherlands has addressed biodiversity issues in corresponding policy regarding.these domains. The section also provides various internet links to

relevant policy documents, preferably to English versions. The sections 3.2 to 3.4 subsequently briefly indicate by what processes biodiversity was integrated in such plans, how the ecosystem approach has been adopted, and to which extent biodiversity is included in environmental assessments. For outcomes of the several measures, in particular in terms of observed changes in the status and trends of important biodiversity components, and the extent to which these measures contribute to the implementation of biodiversity policy, section 3.5 refers to evaluations by the Netherlands Environmental Assessment Agency. Finally, section 3.6 provides information on how biodiversity has been taken into account in overseas development assistance.

Chapter IV: Conclusions: progress towards the 2010 target and implementation of the Strategic Plan

On the basis of the provisional framework of goals, targets and indicators, section 4.1 reports on progress toward the 2010 target by means of remarks in table 1. As far as appropriate and as far as information was available, for each target and indicator provided by the CBD manual for the present report, information is given on policy efforts in the Netherlands in the context of the targets and indicators. The information includes: national policy targets, incorporation in other sectors, progress made, indicators used and obstacles encountered. Section 4.2 reports on the progress towards the goals and objectives of the Strategic Plan of the CBD. Finally, on basis of the various sources and information referred to in the remainder of the present report, section 4.3 provides brief overall conclusions, as are also incorporated above.

Chapter I

Overview of biodiversity status, trends and threats

1.1 Status of biodiversity in the Netherlands

A comprehensive overview of the species recorded in the Netherlands

- The *Nederlands Soortenregister* <http://www.nederlandsesoorten.nl> (in Dutch; however, includes Latin taxon names) contains the names of all multi-cellular species recorded in the Netherlands (approximately 36.000 species, including over 900 exotic species). For a general summary in English, see: <http://www.nederlandsesoorten.nl/nlsr/nlsr/english.html>. For pie charts summarizing the species numbers of different groups, see: <http://www.milieuennatuurcompendium.nl/indicatoren/nl1046-Aantallen-planten--en-diersoorten.html?i=2-1> (in Dutch). For the species concerned, the *Nederlands Soortenregister* also provides their national red list status, trend data on their populations and their formal status under conservation legislation or policy (in Dutch). The database is also the Dutch node of Encyclopedia of Life (EoL).

Species lists for the Netherlands Antilles

- From 2010, Bonaire, Sint Eustatius and Saba (Netherlands Antilles) will formally become part of the Netherlands. For species lists of Sint Eustatius and Saba, see: <http://www.mina.vomil.an/Pubs/RojerStatia-index.html> and <http://www.mina.vomil.an/Pubs/RojerSaba-index.html>.

Overviews of ecosystems and habitats in the Netherlands

- The *Compendium voor de Leefomgeving* < http://www.compendiumvoordeleefomgeving.nl/onderwerpen/nl0032-Water-en-groene-ruimte.html?i= >; in Dutch) presents various spatial data on the Netherlands. It indicates that agriculture occupies the majority of the total terrestrial area in the Netherlands (two third), followed by forests and dwelling, respectively (see: <http://www.ruimtemonitor.nl/kennisportaal/default.aspx?menucomid=26&pid=34&id=4651&themeId=328>; in Dutch). Natural areas and forests combined occupy 14% of the Dutch land area (see: <http://www.ruimtemonitor.nl/kennisportaal/default.aspx?menucomid=26&pid=34&id=4614&themeId=343>; in Dutch). In addition to the terrestrial area, the Netherlands has a relatively large area of wetlands, particularly concerning four larger inland waters (see: <http://www.ruimtemonitor.nl/kennisportaal/default.aspx?menucomid=26&pid=34&id=4617&themeId=34> and <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl1401-Oppervlaktewater-in-Nederland.html?i=4-33>; in Dutch). Further, as a coastal state, the Netherlands has a Territorial Sea (TS) as well as sovereign rights in the so-called Exclusive Economic Zone (EEZ) in the North Sea. The *Noordzeeatlas* (<http://www. noordzeeatlas.nl/en/index.html>; in English) provides various spatial data on the TS and EEZ, including on marine nature reserves and Lindeboom *et al.* (2008) provide corresponding ecological spatial data in particular.

- The *Gebiedendatabase* (<http://www.synbiosys.alterra.nl/natura2000/>; in Dutch) contains data on specific nature areas in the Netherlands divided by their formal status, including "Natura 2000 areas" (i.e., areas under the EU Bird Directive and EU Habitats Directive), "Protected Nature Reserves" (i.e.,

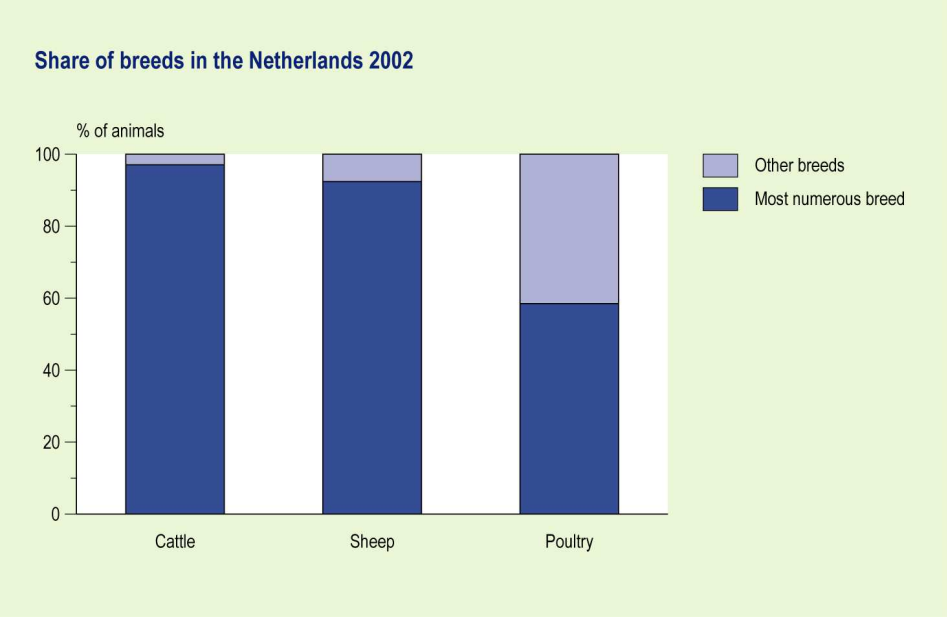

Figure 1 Agro-genetic diversity

Dutch livestock largely consists of a few highly productive, globally used breeds. Cattle and sheep are both almost entirely of a single breed. The globally dominant production breed of sheep happens to be the Dutch 'Texelaar'. In poultry, 99.98% of the globally used commercial breeding lines are either broilers (53%) or layers (57%). The remaining 0.02% consists of about 20 old Dutch breeds. The selection of a few breeds across the world has resulted in a very low genetic diversity in production breeds. Essentially, this homogenisation process is similar to the replacement of the original species in wild biodiversity. The selection of a few global breeds results in a decreasing agro-genetic diversity. *Source: WUR, Animal Science Group, Lelystad. (*Figure and caption provided by the Netherlands Environmental Assessment Agency.)

under the Dutch Nature Conservation Act 1998), "Wetlands" (i.e., under the Ramsar Convention on Wetlands), "National Landscapes" (under the Dutch policy document "National Spatial Strategy: creating space for development"), "National Parks" (for further information, see also <http://www.nationaalpark.nl/documents/home.xml? lang=en> (in English)) and the Dutch "National Ecological Network". For World Heritage Sites in the Netherlands (i.e., under the World Heritage Convention), see: <http://www.werelderfgoed.nl/pages/ en.php> (in English). For overviews of specific Dutch nature areas divided by the organizations that manage these areas, see <http://www.ruimtemonitor.nl/kennisportaal/default.aspx?menucomid=26&pid=34&id=4604&themeId=343> (in Dutch) and the database *Natuurkaart* <http://www.natuurkaart.nl/get?site=natuurkaart.nl> (in Dutch).

- The database *SynBioSys* (for information on the database, see: <http://www.synbiosys.alterra.nl>; in Dutch) provides a spatial overview of plant communities as well as of landscapes in the Netherlands. The *Habitattypendatabase* <http://www.synbiosys.alterra.nl/natura2000/gebiedendatabase.aspx?subj=infohabtypen>; in Dutch) provides spatial data on habitat types in the Netherlands (i.e., under the EU Habitats Directive).

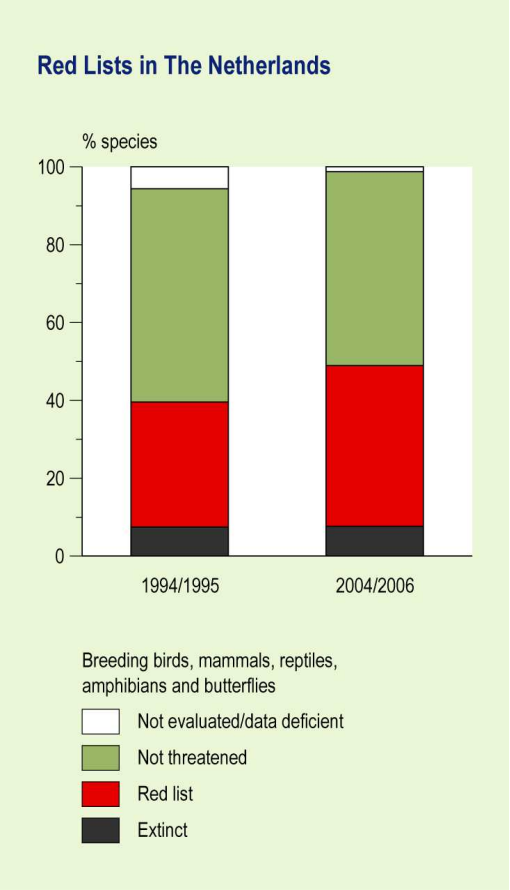

Figure 2 Many red list species are still decreasing

Some of the species are under so much pressure that they have been classified on the Red List. Many Red Listed species show further decline. As a result, the number of species of birds, mammals, reptiles, amphibians and butterflies on the Red List increased during the past decade. A number of species disappeared entirely from the Netherlands over the last century, varying from about 5% of the birds and vascular plants to about 25% of butterflies. Species dependent on clear, meandering streams decreased most, for example, 45% of the stoneflies became extinct. *Source: RAVON, SOVON, VZZ, Vlinderstichting* (Figure and caption provided by the Netherlands Environmental Assessment Agency.)

Genetic resources in the Netherlands

- For information on animal genetic resources, forest genetic resources and plant genetic resources in the Netherlands, see the website of the Centre for Genetic Resources, the Netherlands: <http://www.cgn.wur.nl/UK/> (in English); for forest genetic resources in particular, see also: < http://www.genenbankbomenenstruiken.nl/ > (in Dutch); See also Figure 1.

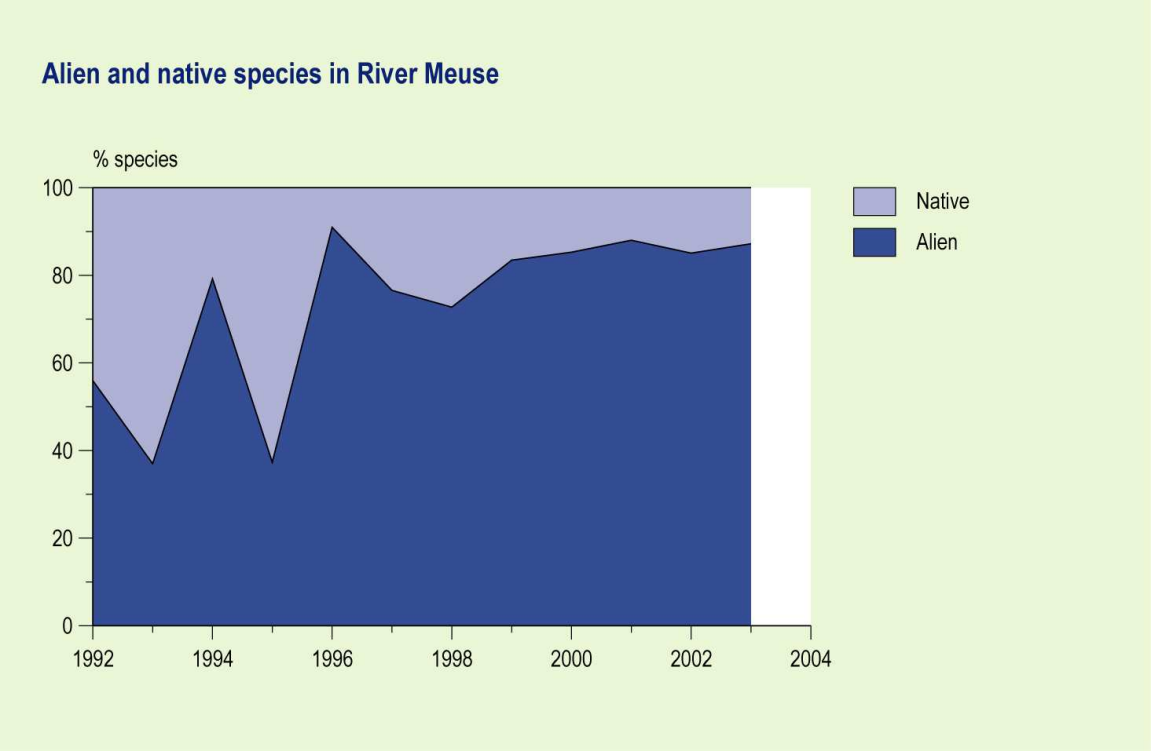

Figure 3 Alien species

New species enter the Netherlands because of new water connections and international transport routes. A well documented example is the Danube-Rhine canal that connects the Danube and Rhine fauna and flora. Nowadays, alien species outnumber the original species in the large Dutch rivers. The native species still occur, and it is not clear yet to what extent alien species are invasive and replace native ones. On land, at least 145 plant species settled in the Netherlands, most in urban regions. The speed with which they do so is increasing, up to two species per year. Also climate change enables pest insects from other continents to settle on trees in the Netherlands because suitable conditions are being created. *Source: Waterdienst, Lelystad.* (Figure and caption provided by the Netherlands Environmental Assessment Agency.)

1.2 Trends regarding biodiversity in the Netherlands

Trends in species numbers and species' populations in the Netherlands

- Van Nieukerken & Van Loon (1995) have published an assessment of long-term changes in the species diversity of the Netherlands;
- As mentioned in 1.1, the *Nederlands Soortenregister* also provides data on the red list status of - individual - species and on their population trends (i.e., data from the National Ecological Monitoring project). In addition, the *Compendium voor de leefomgeving* provides population trend data at the level of species groups; see: <http://www.compendiumvoordeleefomgeving.nl/dossiers/nl0090-natuurgraadmeters.html?i=2-76> (in Dutch).

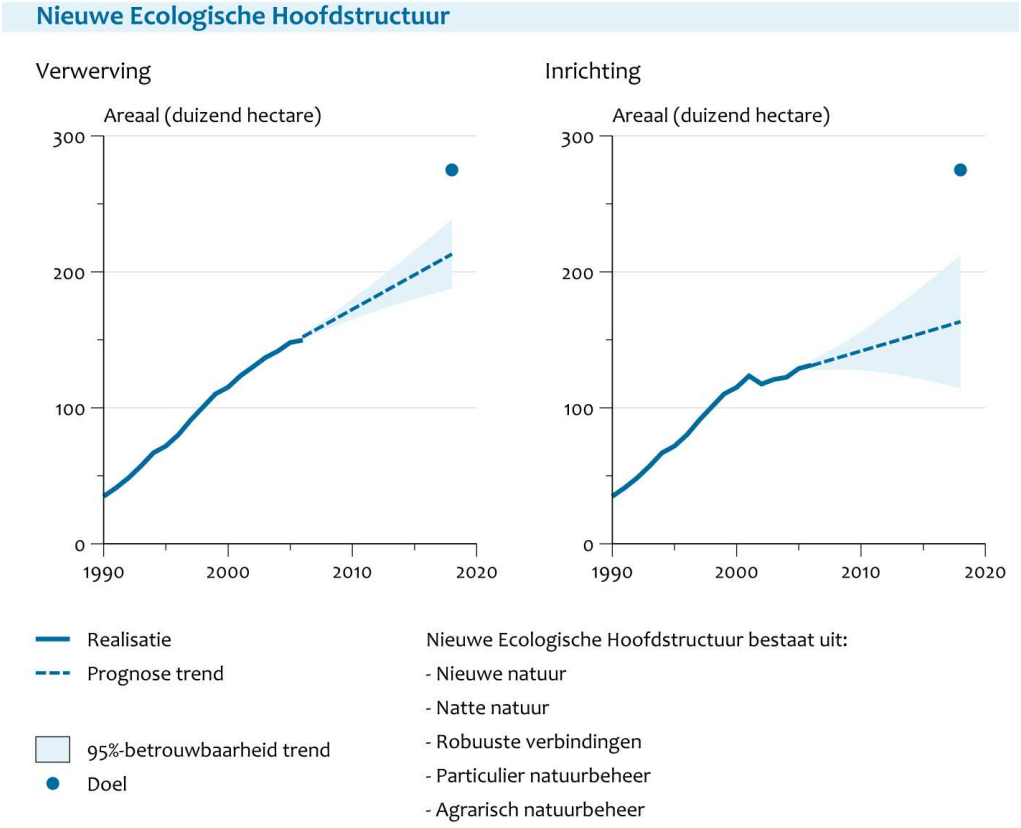

Figure 4 The area of nature reserves is increasing, but more slowly

- *Explanation:* Left graph: acquired areas for the realization of the National Ecological Network (NEN); right graph: areas arranged and managed according to goals regarding the NEN; Y-axis: ×1000 ha; graph lines: realized; dotted graph lines: prognosis; light blue shaded areas: 95%-confidence interval; blue dots: targets.
- *Additional comments:* The Dutch government has the intention to enlarge the area of nature reserves in the Netherlands with about 275.000 ha to a total of 728.500 ha in the year 2020. This 250.000 ha should be achieved by converting agricultural land for professional nature protection organizations (50%) or for private parties (15%), and by agri-environmental schemes for farmers (35%). The area is still increasing, but this process is proceeding more and more slowly. Moreover, the number of hectares of habitat managed by private parties and farmers is disappointing in practice.
- *Source:* Planbureau voor de Leefomgeving 2009a, p. 19.

- Indicators based on changes in the numbers of species for different national red list categories are used by:
  - the National budget (see part XIV, chapter 23, *outcome-indicator soorten* (outcome indicator for species); see: <http://www.rijksbegroting.nl/2009/voorbereiding/begroting,kst119610b_11.html > ; in Dutch);

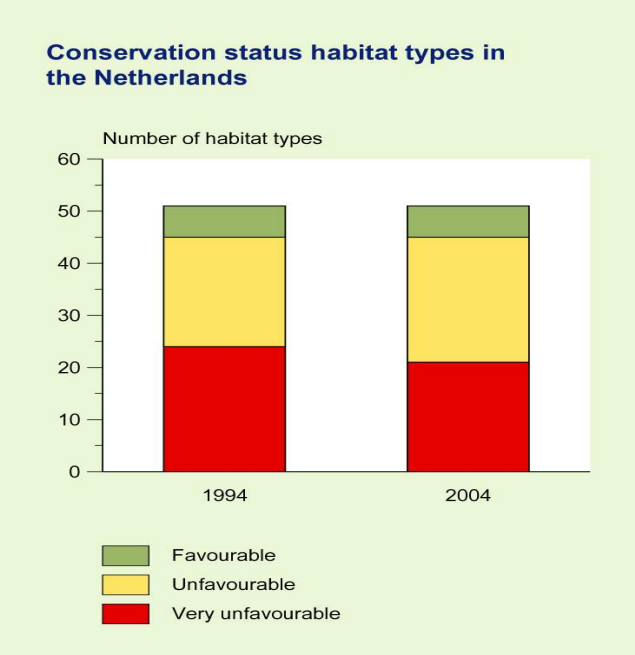

Figure 5 Many habitats in unfavourable condition

Most of the 51 Dutch habitats that are protected by the Habitats Directive have an unfavourable conservation status. Many of these habitats are of European importance, especially those that reflect the delta character of the Netherlands. A little improvement was made in the last decennium. *Source: Department of LNV.* (Figure and caption provided by the Netherlands Environmental Assessment Agency.)

- the Netherlands Environmental Assessment Agency (e.g., Figure 2).

- For trends in the numbers of alien animal species in the Netherlands, see: <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl1375-Exoten-in-de-%20Nederlandse-fauna.html?i=2-41> (in Dutch). For trends in the numbers of alien plant species in the Netherlands, see: <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl1398-Exoten-in-de-Nederlandse-flora.html?i=2-41> (in Dutch). See also Figure 3.
- For recent statistics and trends in the *use* of specific species by Dutch fisheries, see Bartelings *et al.* (2007);
- For recent statistics and trends in the *use* of specific game species by Dutch recreational hunters, see Montizaan & Siebenga (2007).

Trends regarding ecosystems and habitats in the Netherlands

- An indicator for the quantity and quality of main ecosystems in the Netherlands will be incorporated in the national budget from 2010. Further, the Netherlands Environmental Assessment Agency has developed a Natural Capital Index indicating long-term trends in this quantity and quality; see: <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl1119-Natuurwaarde-landelijk.html?i=2-76> (in Dutch); See also:
  - <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl1520-Ontwikkeling-kwaliteit-natuur--heide-bos-moeras.html?i=2-76> (in Dutch);
  - Reijnen (2007a) and Bredenoord *et al.* (2008, p. 23);
  - the third National Report of the Netherlands to the CBD (p. 4).
- For trends in the total area of nature reserves in the Netherlands (i.e., the Dutch National Ecological Network), see Figure 4 and also the progress reports referred to in section 2.4.

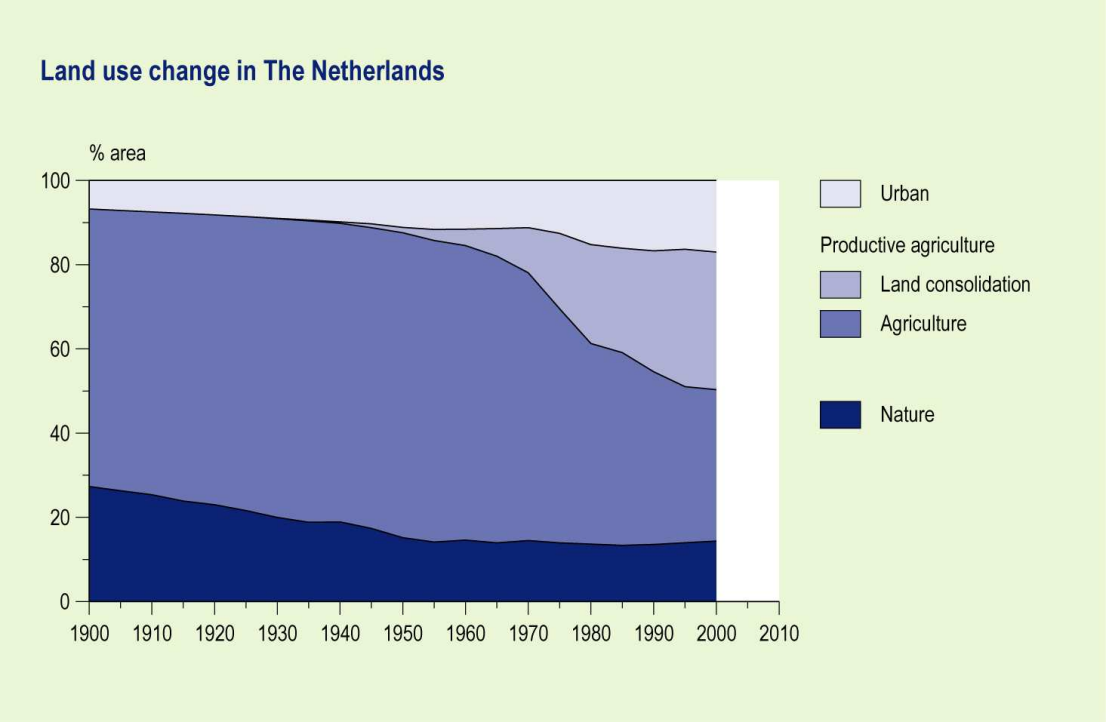

Figure 6 Trends in land use in the Netherlands

In the first half of the 20th century, nature areas have been converted to agriculture on a large scale. In the second half of the 20th century, land use became more and more intensive. Small farm systems were transformed into large farms systems with high input and industrial management practices. Natural and semi-natural elements, such as hedges, ditches and tree patches were decimated. This intensification has an ongoing negative effect on biodiversity, both inside and outside the agricultural areas. Transport infrastructure, residential and industrial development, caused extra negative effects especially since the 1960s. *Source: Netherlands Environmental Assessment Agency (PBL); based on data from Statistics Netherlands (CBS).* (Figure and caption provided by the Netherlands Environmental Assessment Agency.)

- For trends in the conditions of 51 habitat types in the Netherlands (i.e., under the EU Habitats Directive), see Figure 5.

1.3 Main threats to biodiversity

- Among the threats to animal diversity in the Netherlands during the 20th century were threats to rivers due to large-scale hydraulic works, organic pollution and salinization, the disappearance of eelgrass beds in the Wadden Sea, straightening of water coarses, reclaiming of heathlands and grasslands as well as the subsequent acidification, eutrophication and desiccation of these lands, and the disappearance of flowery areas (Koomen *et al.* 1995). Among the threats to plant diversity (including lichens, algae and macrofungi) in the Netherlands during the 20th century were air pollution, nitrogen deposition, habitat destruction (including of heathlands, grasslands, moors and dunes), the disappearance of eelgrass beds in the Wadden Sea, increased water temperatures, acidification and eutrophication of waters, and decreased vitality of forests (Van der Meijden *et al.* 1995). More generally, changes in land use posed a main treat to biodiversity in the Netherlands during the 20th century, as is also explained in Figure 6.

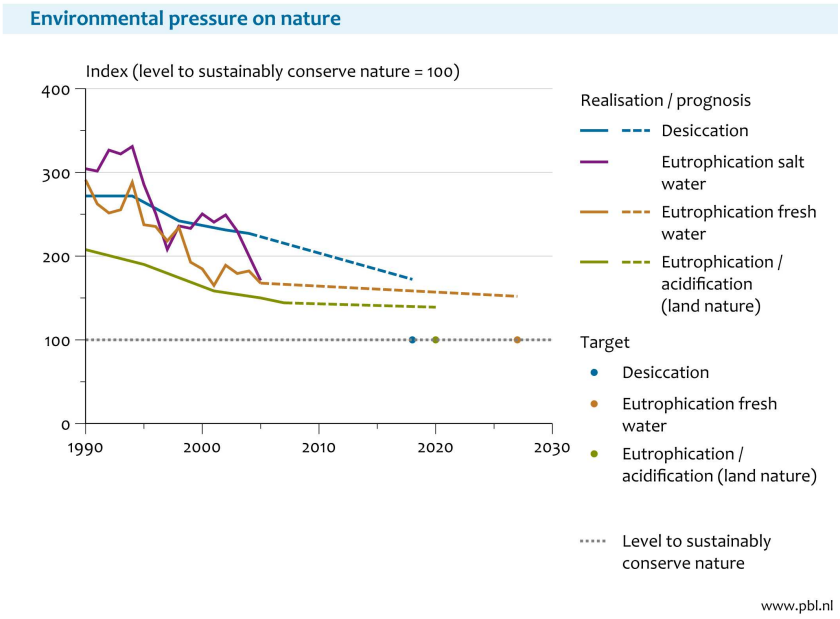

Figure 7 Environmental pressure on nature

Environmental pressures have diminished over the past decades. Inputs of nutrients in terrestrial and aquatic habitats have been lowered, significantly. However, current nitrogen deposition, for a large proportion originating from agriculture, exceeds still the critical limits for no effect, ground water tables are too low and aquatic ecosystems are eutrophied. As a result, nutrient poor and (ground)water dependent habitats are still under threat. Dry and moist heath, bogs, forests and (semi)natural grasslands are most affected. (Figure and caption provided by the Netherlands Environmental Assessment Agency.)

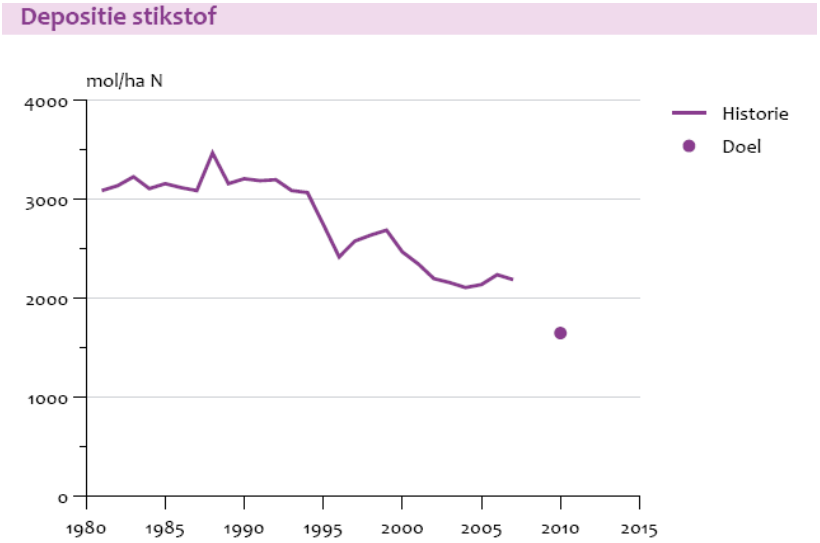

Figure 8 Nitrogen deposition in the Netherlands

Explanation: the line indicates deposition levels over time; the dot indicates the 2010 deposition target; Source: Planbureau voor de Leefomgeving (2009b, p. 132).

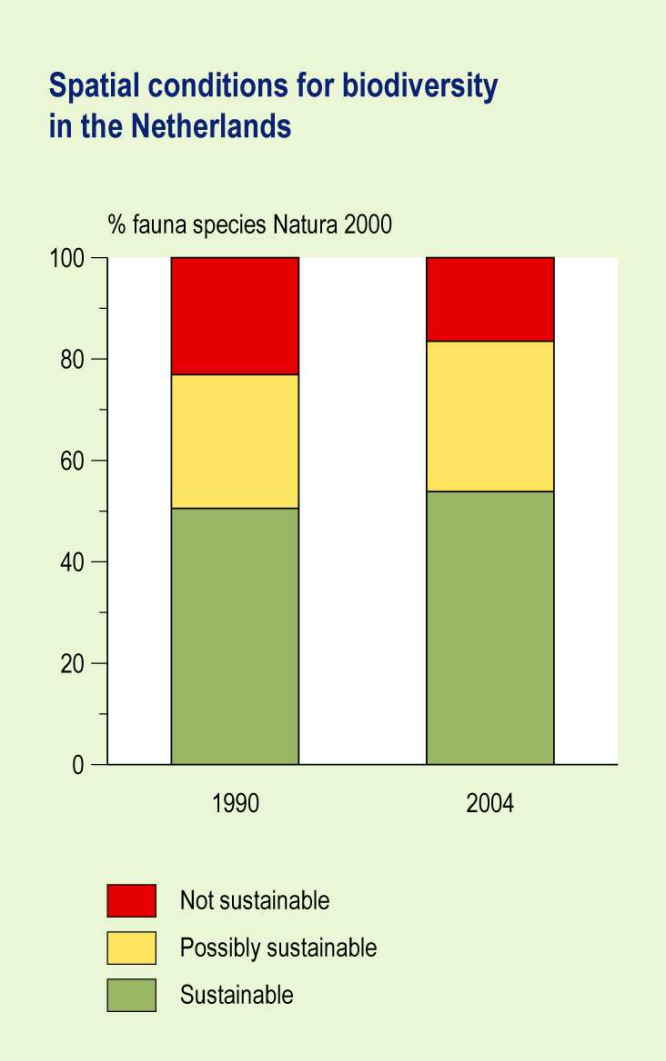

Figure 9 Fragmentation

Habitat loss and fragmentation deteriorate the spatial conditions of a large number of species. By 1990, the spatial requirements for of 43% of the species were possibly not met. The Ecological Main Structure slowly counters fragmentation, however, after completion the spatial requirements will still not be met for 10-30% of the species. Fragmentation is most serious in marshes, moist grasslands, streams and lakes. Parts of the dunes and heathlands are fragmented, too, and do not fit the needs of their characteristic species. *Source: WUR, Alterra, Wageningen*. (Figure and caption provided by the Netherlands Environmental Assessment Agency)

- More recent trends in threats to biodiversity are explained in the Figures 7-11.

1.4 Implications of observed changes in the status of biodiversity components in the Netherlands

For integrative analyses of changes in biodiversity in the Netherlands, see those prepared by the Netherlands Environmental Assessment Agency, in particular the yearly reports

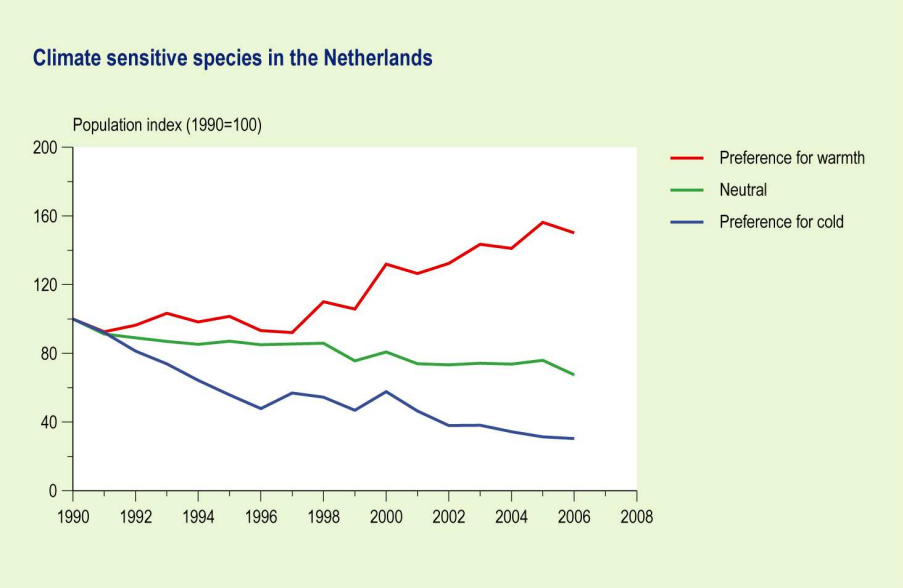

Figure 10 Climate change

Climate change causes a shift in species distribution and enlarges the growing season of plants. Distribution shifts are noticeable even in a country as small as the Netherlands. For a selection of species in the Netherlands, the trends show that species with a preference for a cool environment decrease, while species that prefer warmth increase. *Source: WUR, Alterra, Wageningen.* (Figure and caption provided by the Netherlands Environmental Assessment Agency.)

"Nature Balance" *(Natuurbalans*). For links to English summaries of the most recent reports of the "Nature Balance", see hereafter:

- 2009: < http://www.pbl.nl/images/Nature_Balance_2009_-_Summary_tcm61-44828.pdf >
- 2008: <http://www.rivm.nl/bibliotheek/rapporten/500402015.pdf>
- 2007: <http://www.mnp.nl/images/500402007_tcm61-35209.pdf>
- 2006: <http://www.rivm.nl/bibliotheek/rapporten/500402003.pdf>
- 2005: <http://www.pbl.nl/images/opm%20Summary%20NB2005_tcm61-30723.pdf>
- 2004: <http://www.rivm.nl/bibliotheek/digitaaldepot/NB2004Summary.pdf>
- 2003: <http://www.pbl.nl/en/publications/2003/Nature_Balance_2003.html>

In addition, the annual "Environmental Balance" (*Milieubalans*) also published by the Agency is also of relevance for biodiversity issues; for the most recent report of the "Environmental Balance" (2009) an English summary is available: <http://pbl.nl/en/publications/2009/Environmental-Balance-2009.-Summary.html>.

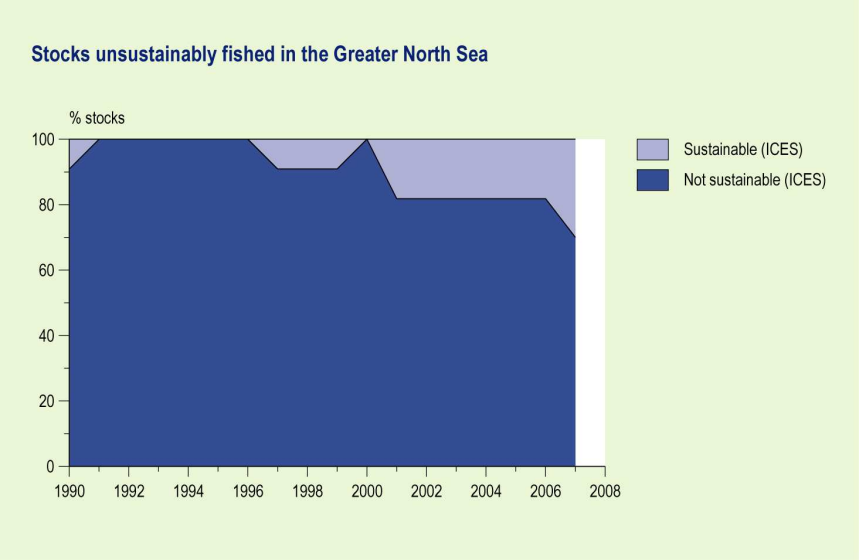

Figure 11 Fisheries

Although it has not been measured in detail, yet, biodiversity does not appear to be improving in the North Sea. However, fishing for most stocks of commercial fish species in the North Sea does not meet the sustainability criteria of the ICES, regarding spawning biomass and fish mortality. For example, the stocks of Cod and Sole are below their biologically safe numbers. The collateral damage caused by the fishing gear is high. An estimated 75% of the catch is discarded, and in most cases does not survive.
Source: ICES. (Figure and caption provided by the Netherlands Environmental Assessment Agency.)

Chapter II

Current status of national biodiversity strategies and action plans

2.1 A brief description of Dutch NBSAPs

The first NBSAP

- The first NBSAP in the Netherlands was the "Strategic Action Plan for Biodiversity" (*Strategisch plan van aanpak biologische diversiteit*; 1995; see: <http://en.biodiversiteit.nl/nederlandse-overheid-biodiversiteit/biodiversiteitsbeleid-1994-2007/strategisch-plan-aanpak-biologische-diversiteit>; in Dutch). The plan has been evaluated by Romijn *et al.* (1998).

Other NBSAPs

- The policy document "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century" (*Natuur voor mensen, mensen voor natuur: nota natuur, bos en landschap in de 21e eeuw*; 2000; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=41642>; in English) has integrated several CBD targets. The document has replaced the Strategic Action Plan for Biodiversity.

Several related or policy documents addressing specific biodiversity targets have also been published since then, including:

- the "fourth National Environmental Policy Plan" (*vierde Nationaal milieubeleidsplan*; see for a summary in English, Spanish, French or German: <http://international.vrom.nl/pagina.html?id=37582>);
- "Sources of our existence: conservation and the sustainable use of genetic diversity" (*Bronnen van ons bestaan: behoud en duurzaam gebruik van genetische diversiteit*; 2002; see: < http://en.biodiversiteit.nl/nederlandse-overheid-biodiversiteit/biodiversiteitsbeleid-1994-2007/beleidsnota-bronnen-ons-bestaan > (in English));
- the "International Policy Programme on Biodiversity 2002-2006" (*Internationaal beleidsprogramma biodiversiteit 2002-2006*; 2002; see <http://en.biodiversiteit.nl/nederlandse-overheid-biodiversiteit/biodiversiteitsbeleid-1994-2007/internationaal-beleidsprogramma-biodiversiteit> (in Dutch and English); the plan has been officially evaluated by Ten Holt & Broer (2006; see: <http://www.minlnv.nl/portal/page?_pageid=116,1645851&_dad=portal&_schema=PORTAL&p_file_id=12850> (in Dutch)) and, unofficially, by the Ecology and Development Working Group of the IUCN National Committee of the Netherlands (see: <http://www.iucn.nl/sbeos/doc/file.php?nid=4894> (in Dutch));
- "Agenda for a Living Countryside/ Multi-year programme for a living countryside 2004: Responding to change" (*Agenda voor een vitaal platteland: inspelen op veranderingen*; 2004; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=13790>; in English);
- a policy document on soil policy which also addresses the issue of soil biodiversity (see <http://www.vrom.nl/docs/internationaal/7178menarev%5B1%5D.pdf>; in English);
- the "Multi-year Programme on Defragmentation" (*Meerjarenprogramma ontsnippering*; 2004; see: <http://www.mjpo.nl/downloads/MJPO_2004.pdf>; (in Dutch)). Progress has been reported in annual reports (see 2.4);

- the "Policy Letter on Agrobiodiversity" (*Beleidsbrief Biodiversiteit in de landbouw*; 2004; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640321&_dad=portal&_schema=PORTAL&p_file_id=17471> (in Dutch)), as well as a follow-up of this document (see: <http://www.minlnv.nl/portal/page?_pageid=116,1640321&_dad=portal&_schema=PORTAL&p_file_id=33663>; in Dutch).

The most recent NBSAP

- The most recent NBSAP of the Netherlands is the policy plan "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (*Biodiversiteit werkt: voor natuur, voor mensen, voor altijd: beleidsprogramma biodiversiteit 2008-2011*; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=40923>; in English). In addition, the document "Biodiversity implementation programme" (*Uitvoeringsprogramma biodiversiteit*; 2009); see: <http://www.minlnv.nl/portal/page?_pageid=116,1640321&_dad=portal&_schema=PORTAL&p_file_id=36645>; in Dutch) contains more detailed actions on basis of the plan. For the issue of biodiversity in particular, the plan "Biodiversity works: for nature, for people, for ever" is an update of the document "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century" (see above). It also replaces the "International Policy Programme on Biodiversity 2002-2006" (see above);
- In addition, the "Policy Note on Invasive Alien Species" (*beleidsnota Invasieve exoten*; 2007; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=44084>; in English) and the document "The habitat-based approach: a new species policy" (*De leefgebiedenbenadering: een nieuwe beleidsstrategie voor soorten*; 2007; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=42762>; in English) have been published.

2.2 An indication of whether and where targets and indicators (both global and national) adopted under the Convention have been incorporated into NBSAPs

In the text below, with reference to articles, programmes and cross-cutting issues of the CBD, several indications are given of whether and where CBD *targets* have been adopted by the Netherlands (i.e., not necessarily aimed at the CBD itself). It has not been the intention to be comprehensive. In addition, where appropriate, indicators used regarding progress in reaching the targets are indicated.

CBD articles

- *Article 6a (developing national strategies, plans and programmes)*:
  Targets:
  According to chapter II (including the articles 4, 5 and 6) of the Nature Conservation Act 1998 (*Natuurbeschermingswet 1998*), a national policy plan on nature and landscape should be produced periodically in the Netherlands. This includes biodiversity policy.

- *Article 7 (identification and monitoring)*:
  Targets regarding the identification of ecosystems, habitats and species:
  According to Chapter II of the Nature Conservation Act 1998 areas to be protected within the framework of the EU Birds Directive and Habitats Directive should be -

and have been - identified (and designated). In addition, important ecosystems, habitats and species have also been identified within the context of realization of the Dutch National Ecological Network (see also below under article 8a and 8b). Further, according to article 7 of the Flora and Fauna Act 1998 (*Flora- en faunawet 1998*), threatened species should be identified; for 18 different species groups, red list have been published or updated (see also 1.2).
Targets regarding monitoring:
Several monitoring targets regarding biodiversity have been set in the policy documents "Nature for people, people for nature" (see chapter 4: "monitoring and evaluation") and "Biodiversity works: for nature, for people, for ever" (see chapter 5: "evaluation and monitoring"); (see 2.1 for links to the documents).

- *Article 8a (establishment of a system of protected areas):*
Targets:
Policy documents or acts with targets for a system of protected areas include:
- chapter III of the Nature Conservation Act 1998;
- the national budget (e.g., 2009; see part XIV, chapter 23; see: <http://www.rijksbegroting.nl/2009/voorbereiding/begroting,kst119610b_11.html > (in Dutch));
- the document "Nature for people, people for nature": paragraph 2.2: "the Grand Plan for Nature" (see 2.1);
- the document "Agenda for a Living Countryside/ Multi-year programme for a living countryside 2004: Responding to change": see Appendix 3 in the document for various specific policy objectives and operational goals (see 2.1);
- the document "National Spatial Strategy" (*Nota Ruimte*; 2005); for English information and summary, see: <http://international.vrom.nl/pagina.html?id=37412>;
- the document "Biodiversity works: for nature, for people, for ever": paragraph 3.3.4 in the document: "ecological networks" (see 2.1)
See further the Thematic Report of the Netherlands on Protected Areas (2003).
Indicators:
- The national budget also includes an outcome indicator corresponding to the target (e.g., 2009; see part XIV, chapter 23; see: <http://www.rijksbegroting.nl/2009/voorbereiding/begroting,kst119610b_11.html > (in Dutch)).
- See further Figure 4, 12 and 13.

- *Article 8b (guidelines for selection, establishment and management of protected areas):*
Targets:
- Documents referred to under the previous article (8a) also include guidelines for the selection and establishment of protected areas in the Dutch National Ecological Network; actual selection and establishment of these areas is a responsibility of provincial governments.
- Documents with targets on selection etc. of protected areas under the EU Birds Directive and Habitats Directive in particular include the Natura 2000 targets document (see for a summary in English: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=19683>.
See further the CBD Thematic Report of the Netherlands on Protected Areas (2003).

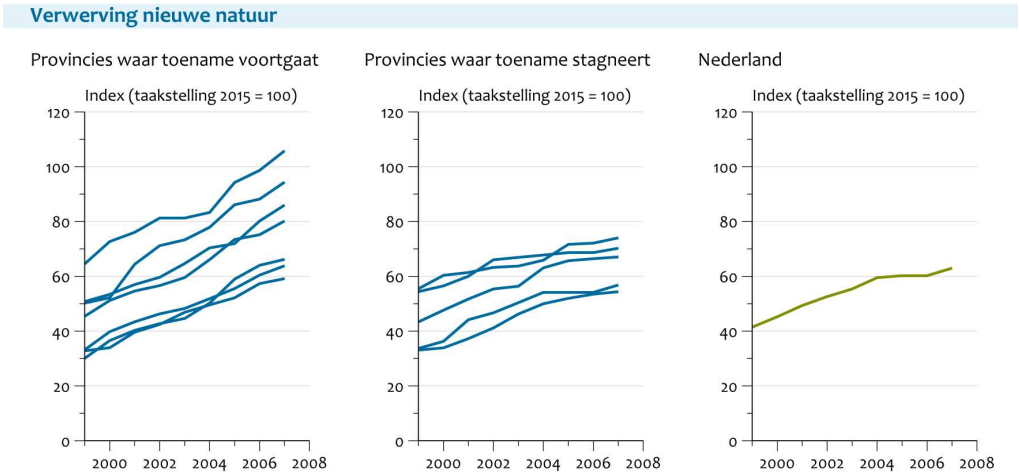

Figure 12 the total area of new areas that have been acquired by the government as part of the Dutch National Ecological Network (NEN)

- *Explanation*: y-axis: index values for the area of new acquired areas (target 2015 = 100); blue lines: in individual provinces; green line: overall trend for the Netherlands;
- *Additional comments*: on average, the acquirement of areas as new building blocks for the NEN steadily increases; a number of provinces has reached over 80% of the target, in other provinces, however, acquirement has stagnated;
- *Source*: Planbureau voor de Leefomgeving 2009a, p. 48.

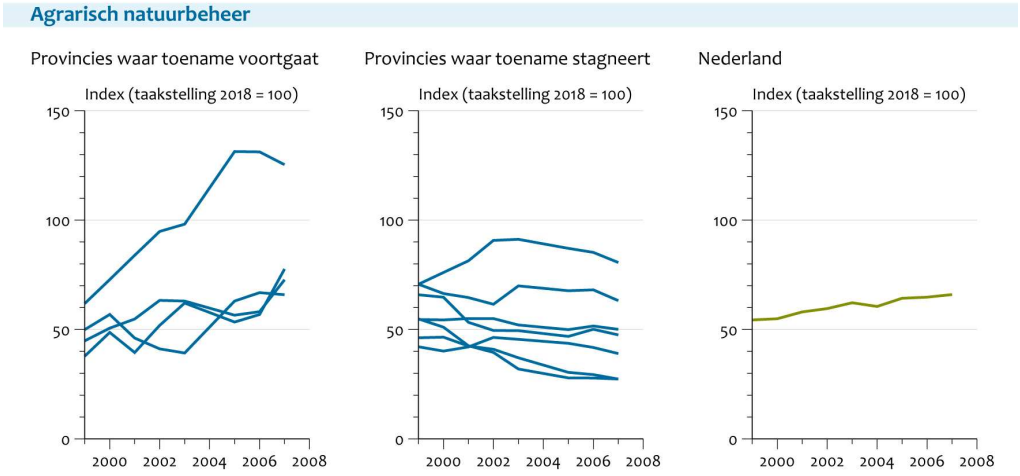

Figure 13 the total area of the Dutch National Ecological Network that is subject to subsidized nature management by farmers

- *Explanation*: y-axis: index values for the area that has become subjected to subsidized nature management by farmers of new acquired areas (target 2018 = 100); blue lines: in individual provinces; green line: overall trend for the Netherlands;
- *Additional comments*: the total area under subsidized nature management by farmers fluctuates; in many provinces growth has stagnated or the total area is declining;
- *Source*: Planbureau voor de Leefomgeving 2009a, p. 51.

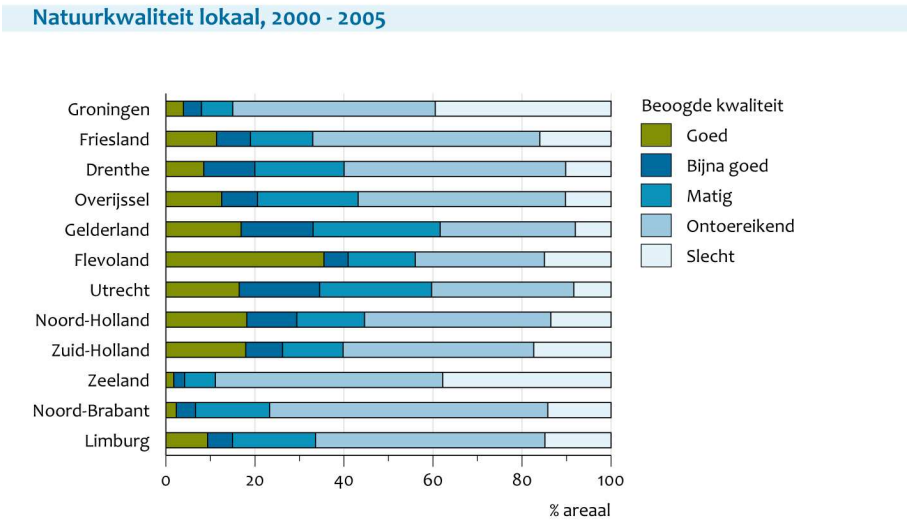

Figure 14 local quality of nature by province in the Netherlands (2000-2005)

- *Explanation*: horizontal bars: scores of the quality of local nature areas in 12 different provinces in the Netherlands as compared to policy targets set; green: good, dark blue: almost good, intermediate blue: modest, light blue: insufficient, very light blue: bad;
- *Additional comments*: nature areas of low quality are present in all provinces; particularly large nature areas represent biodiversity hotspots;
- *Source*: Planbureau voor de Leefomgeving 2009a, p. 55.

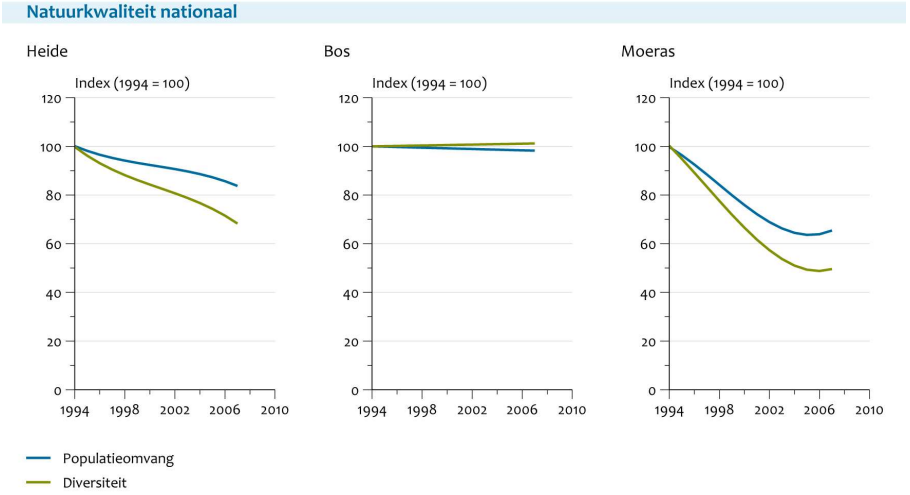

Figure 15 Trends in national nature quality for heath lands, forests, and moors

- *Explanation*: y-axis index values for quality; blue lines: population sizes; green lines: diversity; left graph heath lands, middle graph: forest, right graph: moors;
- *Additional comments*: since the early nineties average nature quality of all nature types distinguished has declined, but in forests and moors, the decline has decreased;
- *Source*: Planbureau voor de Leefomgeving 2009a, p. 57.

Indicators:
- For the realization of 'nature quality' in protected areas, see Figure 5, 14 and 15.
- See also the indicators referred to under the previous article (8a).

- *Article 8c (regulation or management of biological resources):*
  Targets:
  The Flora and Fauna Act 1998, Nature Conservation Act 1998 and Fisheries Act 1963 are main instruments for regulating biological resources in the Netherlands and also contain some general targets.

- *Article 8d (Promote the protection of ecosystems, natural habitats and the maintenance of viable populations of species in natural surroundings):*
  A variety of instruments and targets deals with this issue. See e.g. the policy document "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century" (see 2.1).

- *Article 8e (Promote environmentally sound and sustainable development in areas adjacent to protected areas):*
  Targets:
  The Nature Conservation Act 1998 provides for preventing negative effects from areas adjacent on those protected under the EU Birds Directive and Habitats Directive. Further, the "Policy letter on soil management" (see 2.1) promotes the sustainable use of soil in the countryside, particularly in agricultural and natural areas.

- *Article 8f (rehabilitation and restoration of degraded ecosystems and promoting the recovery of threatened species):*
  Targets:
  Similar targets are addressed by the policy document "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century" (see 2.1).

- *Article 8g (means to regulate, manage or control the risks of living modified organisms):*
  Targets:
  Similar targets are addressed by the following act: *Besluit genetisch gemodificeerde organismen milieubeheer*. The act implements the EU directives 2001/18/eg and 90/219/eg which in turn represent much of the implementation of the Biosafety Protocol. Other acts relevant for the implementation of the Biosafety Protocol include EU regulations EC/1946/2003, EC/1829/2003 and EC/1830/2003. For further details, see the first national report on the implementation of the Biosafety Protocol, provided by the Netherlands and the EC.

- Article *8h (prevention of the introduction of, control or eradication of alien species):*
  Targets:
  Corresponding targets are addressed in a policy document on invasive alien species (see 2.1).
  Indicators:
  See for indicators for numbers of alien animal and plant species: 1.2., under 'Trends in species numbers and species' populations in the Netherlands'; for various other indicators regarding alien species in the Netherlands, see:
  - < http://www.compendiumvoordeleefomgeving.nl/dossiers/nl0049-exoten.html?i=2-41 > (in Dutch);

- Figure 3;
- Van der Weijden *et al.* (2007).

- *Article 8k (maintain necessary legislation for the protection of threatened species):*
  Targets:
  See above under article 8c.

- *Article 8l (regulate or manage relevant processes and activities with adverse effects on biodiversity):*
  Targets:
  Spatial and environmental policies in the Netherlands address this issue.

- *Article 8m (Cooperate in providing financial and other support for in-situ conservation):*
  Targets:
  Documents with targets on this issue include the policy plan "Biodiversity works: for nature, for people, for ever" (see 2.1).

- *Article 9 (Ex-situ Conservation):*
  Targets:
  Targets regarding ex-situ conservation of wild species are included in the policy documents "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century" (for species in general) and "Sources of our existence: conservation and the sustainable use of genetic diversity" (for trees) (see 2.1). Targets regarding ex-situ conservation of domesticated species have been included in the last mentioned document.

- *Article 10 (Sustainable Use of Components of Biological Diversity):*
  Targets:
  See above under article 8c.
  Indicators:
  See, e.g., Figure 11 and 16 and Van Veen *et al.* (2008, p. 8-9).

- *Article 11 (Incentive Measures):*
  Targets:
  Policy documents addressing targets on this issue include: "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century", "fourth National Environmental Policy Plan" and "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Article 12 (Research and Training):*
  Targets:
  Targets regarding this article have been addressed in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Article 13 (Public Education and Awareness):*
  Targets:
  Policy documents addressing targets on this issue include: "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century", "fourth National Environmental Policy Plan" and "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

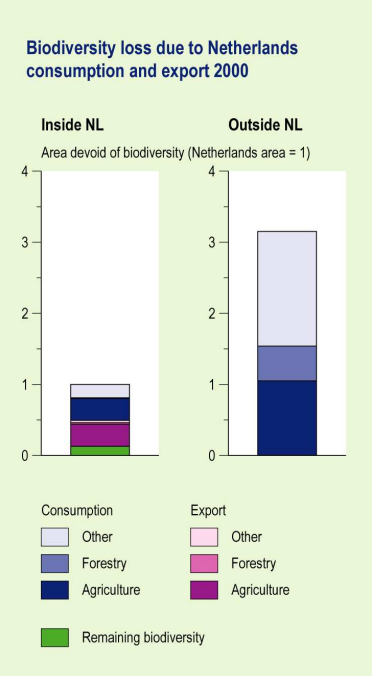

Figure 16 Biodiversity loss due to Netherlands consumption and export
The total Dutch biodiversity footprint on land outside the Netherlands corresponds with an area of about 3 times the size of the Netherlands that has lost its entire biodiversity. Outlooks predict that this area will further increase, showing a continuing impact of Dutch consumption on global biodiversity. In the Netherlands itself, biodiversity is lost because land is used for Dutch consumption and for export products. *SEBI indicator 23. Source: Netherlands Environmental Assessment Agency.*

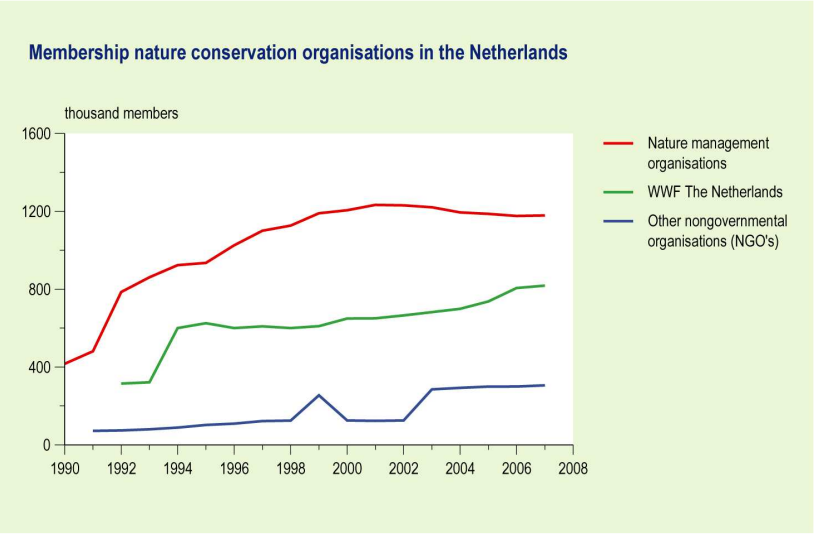

Figure 17 Membership nature conservation organisations in the Netherlands
The awareness of the need for nature protection is reflected in the number of people who financially support non-governmental nature conservation organisations, such as *Natuurmonumenten* and the World Wildlife Fund. Most Dutch citizens show a high to medium awareness of the importance of nature protection. Only a limited group (around 10%) rejects the need for nature protection. However, the group most aware of the need for nature protection has decreased from 42% in 2001 to 30% in 2006. *SEBI indicator 26. Source: Netherlands Environmental Assessment Agency.*

Indicators:
- See Figure 17 and Van Veen *et al.* (2008, p. 11);
- See also the scores regarding the Netherlands in the report by The Gallop Organization (2007).

- *Article 14 (Impact Assessment and Minimizing Adverse Impacts):*
  Targets:
  Except for biodiversity components addressed by the EU Birds Directive and Habitats Directive, Dutch EIA legislation does currently not explicitly include targets regarding the consideration of biodiversity.
  Indicators:
  For information on EIAs in the Netherlands, contact the Netherlands Commission for Environmental Assessment; see: <http://www.eia.nl/default.asp>.

- *Article 15 (Access to Genetic Resources):*
  Targets:
  Targets have been formulated in the document "Sources of our existence: conservation and the sustainable use of genetic diversity" (see 2.1).

- *Article 16 (Access to and Transfer of technology):*
  Targets:
  The Netherlands contributes actively to the development of international agreements on the access to genetic resources and an equal sharing of benefits (ABS = Access and Benefit Sharing). In 2010, an international agreement has to be reached that arranges the rights and obligations of producers and users of genetic knowledge and sources.
  To facilitate access and transfer of technology the Netherlands – under ODA – also supports various scientific institutions of the CGIAR (Consultative Group on International Agricultural Research with €7.5 million per year (Bioversity, CIFOR, ICARDA, ICRAF, IFPRI, IWMI and some CG-wide activities).

  The Netherlands Environmental Asessment Agency has been supported to implement strategic policy analysis in the field of environment, nature and spatial planning. It assisted various international and multilateral organisations. With UNEP a global biodiversity assessment model was created. The model was used in global studies, such as the OECD Environmental Outlook, GEO4 and TEEB. The Agency also published a report for the Club of Rome Global Assembly in 2009 called "Growing within Limits".

- *Article 17 (Exchange of Information):*
  Targets:
  Targets regarding this issue are addressed in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Article 18 (Technical and Scientific Cooperation):*
  Targets:
  Targets regarding this issue are addressed in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Article 19 (Handling of Biotechnology and Distribution of its Benefits):*
  Targets:
  Targets have been included in the national budget; see also "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Article 20 (Financial Resources):*
  Targets:
  For recent data on expenditures for nature management in the Netherlands, see: <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl0519-Kosten-en-financiering-natuur--en-landschapsbeheer.html?i=10-57> (in Dutch).

Thematic Programmes of the CBD

- *Agricultural Biodiversity*
  Targets:
  Documents addressing targets regarding this issue include the "Policy Letter on Agro biodiversity" and "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).
  Indicators:
  - For various indicators regarding agriculture and nature, see: <http://www.compendiumvoordeleefomgeving.nl/dossiers/nl0069-landbouw-en-natuur.html?i=11-59> (in Dutch);
  - For various indicators regarding agriculture and environment, see in files in: <http://www.compendiumvoordeleefomgeving.nl/onderwerpen/nl0011-Landbouw-en-milieu.html?i=11> (in Dutch).

- *Dry and Sub-humid Lands Biodiversity*
  Targets:
  N/A in domestic policy; international Dutch efforts within the UNCCD framework.

- *Forest Biodiversity*
  Targets:
  In its policy on forests within national borders, the Netherlands is working on implementing the EU Forest Action Plan which, in turn, addresses CBD targets. Targets regarding forests abroad have been set in the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1)
  Indicators:
  - See Van Veen *et al.* (2008, p.8);
  - for various other indicators regarding forests in the Netherlands, see: <http://www.compendiumvoordeleefomgeving.nl/dossiers/nl0032-bos.html?i=4-25> (in Dutch).

- *Inland Waters Biodiversity*
  Targets:
  A goal of the European Water Framework Directive (EWFD) is to ensure that the quality of the surface water and groundwater in Europe reaches a high standard ('good ecological status') by the year 2015, including for the sake of biodiversity. For implementation of this directive in domestic Dutch policy, see <http://www.kaderrichtlijnwater.nl/service_functies/english/> (in English). The policy includes the National Water Plan (*Nationaal waterplan*; for a summary in English, see: <http://www.verkeerenwaterstaat.nl/Images/58932ne(Samenvatting%20National%20waterplan)aangepast_tcm195-243151.pdf> and four so-called river basin management plans (*stroomgebiedbeheerplannen*).
  In addition, the EU Nitrates Directive (1991) aims to protect water quality across Europe by preventing nitrates from agricultural sources polluting ground and surface waters and by promoting the use of good farming practices. The Directive is an integral part of the Water Framework Directive and is one of the key

instruments in the protection of waters against agricultural pressures. The various steps of implementation of the Directive are:

(1) Identification of polluted or threatened waters (N), such as: surface freshwaters, in particular those used or intended for the abstraction of drinking water, containing or that could contain a concentration of more than 50 mg/l of nitrates groundwater containing or that could contain more than 50 mg/l of nitrates freshwater bodies, estuaries, coastal waters and marine waters, found to be eutrophic or that could become eutrophic;

(2) Designation of "vulnerable zones" (NVZs), as areas of land which drain into polluted or threatened waters and which contribute to N pollution.

The Directive is currently implemented in Dutch domestic policy by means of the Fourth Dutch action programme Nitrates Directive (2010-2013) (see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=2000343>; in English).

Indicators:

For various indicators related to inland waters biodiversity and policy, see sub files in:
<http://www.compendiumvoordeleefomgeving.nl/onderwerpen/nl0034-Water-en-natuur.html?i=33> (in Dutch).

- *Island Biodiversity*

  Targets:

  The six island states Netherlands Antilles currently have their own nature and environmental policy (see: <http://www.mina.vomil.an/Beleid/main.html>; in English). From 2010, the Netherlands itself will formulate biodiversity policy for three of these islands: Bonaire, Sint Eustatius and Saba.

- *Marine and Coastal Biodiversity*

  Targets:

  This issue of biodiversity has been addressed in the policy document on the North Sea (*Beleidsnota Noordzee 2009-2015*; see: <http://www.verkeerenwaterstaat.nl/Images/d_Beleidsnota_Noordzee_tcm195-269527.pdf>; in Dutch) as an annex to the National Water Plan (see above) and in the Integrated Management Plan for the North Sea 2015 (*Integraal beheerplan Noordzee 2015*; see: <http://www.noordzeeloket.nl/Images/IBN2015%20managementsamenvatting%20(engels)_tcm14-2236.pdf>; in English). In addition, the *Beheerplan Voordelta* (see: <http://www.noordzeeloket.nl/Images/Beheerplan%20Voordelta%20definitief%2016%20juli%202008_tcm14-3811.pdf>; in Dutch) and river basin management plans (*stroomgebiedbeheerplannen*; see above) also address biodiversity in Dutch coastal areas.

- *Mountain Biodiversity*

  Targets:

  Due to the geographical situation in the Netherlands, this is not an issue in Dutch domestic biodiversity policy.

Cross-cutting Issues of the CBD

- *2010 Biodiversity Target*

  This target has been addressed in the national budget (e.g., 2008; see part XIV, chapter 23; link: <http://www.rijksbegroting.nl/2008/voorbereiding/begroting,kst108437b_9.html>; in Dutch) and in the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Access to Genetic Resources and Benefit-sharing*
  Targets:
  See above under article 15.

- *Biodiversity for Development*
  Targets:
  This issue has been addressed in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Climate Change and Biodiversity*
  Targets:
  This issue has been addressed in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1). In addition, the accompanying "Biodiversity implementation programme" (see 2.1) also addresses an advice of the *Deltacommissie* to combine nature and water management efforts for the sake of climate adaptation (see also Deltacommissie 2008).

- *Communication, Education and Public Awareness*
  Targets:
  See above under article 13.

- *Economics, Trade and Incentive Measures*
  Targets:
  This issue has been addressed in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Ecosystem Approach*
  Targets:
  The ecosystem approach has been implicitly applied to the concepts of the Dutch National Ecological Network and the "habitat-based approach". Targets regarding these concepts have been addressed in the documents "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century", "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" and "The habitat-based approach: a new species policy" (see 2.1).

- *Global Strategy for Plant Conservation*
  Targets:
  The GSPC has not been explicitly implemented into Dutch domestic policy. However, in accordance with this Strategy, all indigenous plant species in the Netherlands have been identified (see <http://www.nederlandsesoorten.nl>) as well as plant communities (see e.g., Weeda *et al.* 2000, 2002, 2003, 2003 and <http://www.synbiosys.alterra.nl/> (in Dutch)). In addition, several plant species are protected under the Flora and Fauna Act 1998 and habitat types (based on plant communities) are protected under the Nature Conservation Act 1998 (in accordance with the EU Habitats Directive). Further, the Netherlands (or Dutch organizations) does participate in CBD meetings regarding this issue, in Planta Europa, and in the European Plant Conservation Strategy (under the Bern Convention).

- *Global Taxonomy Initiative*
  Targets:
  Related targets have been addressed in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1). These include the foundation of the Netherlands Centre for

Biodiversity Naturalis (NCB Naturalis), which has been launched in 2010 and which combines the efforts of several Dutch taxonomic institutes.

2.3 Information on how activities under the NBSAP contribute to the implementation of the articles of the Convention and the thematic programmes and cross-cutting issues adopted under the Convention.

See the different policy documents referred to in 2.2 and made assessable in 2.1.

2.4 An overview of progress made in implementation of priority activities or actions, focussing on concrete results achieved.

- For progress made in *various policy targets regarding biodiversity*, see the yearly reports Nature Balance (*Natuurbalans*) referred to in section 1.4, Van Veen *et al.* (2008) and the remarks in table 1 (section 4.1);
- For progress made in the realization of the *Dutch National Ecological Network* in particular, see also the corresponding progress reports regarding 2008 and 2007:
  - The Major Project of the Dutch National Ecological Network: second progress report; reporting year 2008 (*Groot project Ecologische Hoofdstructuur: tweede voortgangsrapportage; rapportagejaar 2008*; 2009); see: <http://www.minlnv.nl/portal/page?_pageid=116,1641062&_dad=portal&_schema=PORTAL&p_file_id=42363> (in Dutch);
  - The Major Project of the Dutch National Ecological Network: first progress report; reporting year 2007 (*Groot project Ecologische Hoofdstructuur: eerste voortgangsrapportage; rapportagejaar 2007*; 2008); see: <http://www.minlnv.nl/portal/page?_pageid=116,1640330&_dad=portal&_schema=PORTAL&p_file_id=30723> (in Dutch);
- Progress made in the realization of *EU Natura 2000 areas (Birds Directive and Habitats Directive)* in particular, is reported periodically to the European Commission;
- For progress made in the realization of the *Multi-year Programme on Defragmentation* (see 2.1) in particular, see also the corresponding annual reports, e.g., regarding 2008, 2007 and 2006 (in Dutch):
  - <http://www.mjpo.nl/downloads/090149-DWW-Jaarverslag08_LR[2].pdf>
  - <http://www.mjpo.nl/downloads/jaarverslag%202007%20MJPO_def.pdf>;
  - <http://www.mjpo.nl/downloads/Jaarverslag%202006%20MJPO.pdf>.

2.5 An indication of domestic and/ or international funding dedicated to priority activities.

See Paragraph 4.2 of the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" and the "Biodiversity Implementation Programme" (see 2.1).

2.6 A review of successes and obstacles encountered in implementation and lessons learned.

See the yearly reports *Natuurbalans* ("Nature Balance") referred to in 1.4 as well as the remarks in table 1 (section 4.1).

2.7 An analysis of the effectiveness of NBSAPs, focussing on (i) Whether observed changes in status and trends in biodiversity (as described in Chapter 1) are a result of measures taken toe implement NBSAPs and the Convention; (ii) Whether the current NBSAP is adequate to address the threats to biodiversity identified in Chapter I; (iii) How implementation of NBSAPs may be improved, where necessary, including suggestions of possible ways and means to overcome identified obstacles.

See the yearly reports *Natuurbalans* ("Nature Balance") referred to in 1.4 as well as the report by the Werkgroep IBO Natuur (2010). In addition, several reports have been published on the effectiveness of the Dutch National Ecological Network, including Lammers *et al.* (2005), Van Egmond & De Koeijer (2005), Algemene Rekenkamer (2006a, 2006b, 2007) and Wiertz *et al.* (2007).

2.8 The specific information requested in COP 8 decisions

- *Information on VIII/5 (Article 8(j))*

Has your country undertaken any measures to enhance and strengthen the capacity of indigenous and local communities to be effectively involved in decision-making related to the use of their traditional knowledge, innovations and practices relevant to the conservation and sustainable use of biodiversity? (decision V/16)

A number of measures has been taken. Through a support Fund – coordinated by the Dutch NGOs Hivos and Oxfam-Novib – the Netherlands has contributed to various international and national organisations, some of which directly worked with indigenous communities or integrated them in broader programmes. In addition, non-governmental organisations implemented activities that focused on poverty and environment under the Co-Financing System (MFS). Those Programmes often included support to indigenous and local communities to strengthen their rights and facilitate participation in decision-making. Core-support was also provided to the regional organisation Amazon Cooperation Treaty Organization (ACTO). In November 2009, ACTO hosted the first meeting between government representatives on indigenous lands and territories of the eight Member Countries: Bolivia, Brazil, Colombia, Ecuador, Guyana, Peru, Suriname and Venezuela. The overall goal of this meeting was to stimulate and deepen the regional political dialogue on the recognition and protection of land and territories rights of indigenous people and other tribal communities of the region. The Netherlands has continued to support the International Tropical and Timber Organisation (ITTO) whereby biodiversity services and the need of local users are essential for sustainable forest management.

Has your country developed appropriate mechanisms, guidelines, legislation or other initiatives to foster and promote the effective participation of indigenous and local communities in decision making, policy planning and development and implementation of the conservation and sustainable use of biodiversity at international, regional, subregional, national and local levels? (decision V/16).

Not relevant in the Netherlands. However, within the context of international cooperation support has been provided (see answer above).

- *Information on VIII/21 (Marine and coastal – deep seabed)*

No efforts by the Netherlands on this issue.

- *Information on VIII/22 (Marine and coastal – IMCAM)*

See 2.2, under Thematic Programmes of the CBD: Marine and Coastal Biodiversity.

- *Information on VIII/24 (Protected areas)*

The Netherlands supports the Global Environment Facility (GEF) through which the implementation of national programmes is supported. Under GEF-4 the Netherlands contributed € 22.25 million per year (The Netherlands aims at 3.3% of total GEF funds), of which one-third is spent for biodiversity activities. The main objective of Dutch development cooperation is support to poverty reduction and economic development for which national agenda's are leading. Environment and biodiversity have to be an integral part of poverty reduction. This priority setting implies that no dedicated support (ODA) was provided to national parties to implement the CBD programme of work or on reporting. National strategies should integrate strategies for conservation and sustainable use of ecosystems and biodiversity. Therefore, Dutch development cooperation provides no direct support to environment, biodiversity, conservation and protection as such. However, support may be provided to programmes focusing on development of rural areas (buffer zones and sustainable use areas) surrounding protected areas in a larger context of ecoregional economic development. Support has been provided to such areas in Ghana, Mongolia and to ecoregional programmes such as the Greater Mekong Ecoregion' Biological Corridor Initiative. In the future support is considered to the Kavango-Zambezi ecoregion in Southern Africa. To enhance regional integration, capacity building and national implementation support is provided – in relation to the Amazon - to the regional organisation ACTO (Amazon Cooperation Treaty Organization).

- *Information on VIII/28 (Impact assessment)*

See 2.2, under CBD articles: article 14.

Chapter III

Sectoral and cross-sectoral integration or mainstreaming of biodiversity considerations

3.1. The extent to which biodiversity has been integrated into sectoral and cross-sectoral strategies and plans

- *Agriculture*
  Biodiversity has been explicitly addressed in the "Policy Letter on Agrobiodiversity" and its follow-up, as well as in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1) and includes promoting useful application of ecosystem services in agriculture. Moreover the document "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century" (see 2.1) includes several targets regarding the conservation of species, such as goose and meadow bird species, in agricultural environments. Further, policy documents addressing more general targets regarding more sustainable agriculture include the following:
  - The Choice for Agriculture (*Kiezen voor landbouw: een visie op de toekomst van de Nederlandse landbouw*; 2005: see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=14089>; in English);
  - Outlook on the future of the livestock sector (*Toekomstvisie op de veehouderij*; 2008; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640321&_dad=portal&_schema=PORTAL&p_file_id=24405>; in Dutch);
  - Policy document on sustainable food (*Nota duurzaam voedsel: naar een duurzame consumptie en productie van ons voedsel*; 2009; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=40703>; in English).

- *Education*
  Targets regarding biodiversity have been addressed in the policy document "To choose, learn and participate: towards effective environmental education in the Netherlands 2008-2011" (*Kiezen, leren en meedoen: naar een effectieve inzet van natuur- en milieueducatie in Nederland 2008-2011*; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640321&_dad=portal&_schema=PORTAL&p_file_id=25423>; in Dutch).

- *Health*
  "Biodiversity" has not explicitly been addressed in Dutch health policy. However, "nature" has been addressed to some extent in a policy document on environment and health (*Nationale aanpak milieu en gezondheid 2008-2012*; see: <http://www.vrom.nl/Docs/milieu/200804_Kamerbrief_nataanpakgezondheidenmilieu.pdf>; in Dutch). In addition, the "Policy Note on Invasive Alien Species" (see 2.1) has considered public health impacts of invasive species.

- *Rural development*
  Biodiversity targets have been addressed in the policy document "Agenda for a Living Countryside/ Multi-year programme for a living countryside 2004: Responding to change" (*Agenda voor een vitaal platteland: inspelen op veranderingen*; 2004; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=13790>; in English).

- *Forestry*
  Targets regarding sustainable forestry within the Netherlands as well as regarding the domestic establishment of different types of forest areas have been addressed in the document "Nature for people, people for nature: policy document for nature, forest and landscape in the 21st century" (see 2.1). Targets regarding the use of legally and sustainably produced timber from outside the Netherlands have been included in "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1). In addition, targets regarding the establishment of a gene bank with indigenous tree species have been included in the document "Sources of our existence: conservation and the sustainable use of genetic diversity" (see 2.1).

- *Fishery*
  Targets regarding the relation fisheries-biodiversity have been addressed in the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).
  Further, policy documents addressing more general targets regarding more sustainable fisheries include the following:
  - Fish as sustainable capital: the Dutch view on the new European fisheries policy (*Vis als duurzaam kapitaal: de Nederlandse visie op het nieuwe Europese visserijbeleid*; 2009; see: <http://www.minlnv.nl/portal/page?_pageid=116,1640360&_dad=portal&_schema=PORTAL&p_file_id=49282>; in English).

- *Mining*
  Mining activities generally require Environmental Impact Assessments. Mining activities in nature areas under the Nature Conservation Act 1998 require special permissions. In addition, permissions under the Flora and Fauna Act 1998 may be required. Further, a code of conduct has been made by the surface mining sector (*Gedragscode van de Federatie van Oppervlaktedelfstoffenwinnende industrieën*) to regulate activities which may harm species that are protected under the Flora and Fauna Act 1998 (see: <http://www.minlnv.nl/portal/page?_pageid=116,1640321&_dad=portal&_schema=PORTAL&p_file_id=42552>; in Dutch)

- *Tourism*
  Documents in which the issue of sustainable tourism and nature have been addressed, within as well as outside the Netherlands, include a policy letter on sustainable tourism and outdoor recreation (Tweede Kamer 2006), a policy letter on outdoor recreation in the Netherlands (Tweede Kamer 2009a) and a policy letter on tourism in and outside the Netherlands (Tweede Kamer 2009b).

- *Finance*
  Targets regarding the financial sector have been addressed in the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Trade*
  For wood, palm oil, soya, biomass, and peat, targets regarding the improvement of the sustainability of international production economic (trade) chains have been addressed in the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

- *Industry*
  For the industry, targets have been addressed in the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1).

3.2 The process(es) by which biodiversity has been integrated into sectoral and cross-sectoral strategies and plans

Instruments applied in above strategies vary from communication and incentives to legal regulation. Generally, concerning sectors have been actively involved in the policy-making processes underlying above strategies and plans. Further, a number of policy plans themselves aim at an integrative area-based approach involving several sectors (e.g., the document "Agenda for a Living Countryside/ Multi-year programme for a living countryside 2004: Responding to change" (see 2.1))

3.3 Adoption and employment of the ecosystem approach in mainstreaming biodiversity into sectoral and cross-sectoral strategies, plans and programmes

The Dutch National Ecological Network (see 1.1, 1.2 and Thematic Report of the Netherlands to the CBD on Protected Areas (2003)) and the Habitat-based approach (see 2.1) are sectoral strategies in accordance with the ecosystem approach. Likewise, the targets "Biodiversity works" and "Marine biodiversity and sustainable fishery" in the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1) may be considered as being examples of corresponding cross-sectoral strategies.

3.4 The extent to which biodiversity is included in environmental impact assessments and strategic environmental assessments undertaken at various levels

See 2.2., under CBD articles: article 14.

3.5 Outcomes achieved through implementation of these measures, in particular in terms of observed changes in the status and trends of important biodiversity components, and the extent to which these measures contribute to the implementation of NBSAPs

As parts of Dutch biodiversity policy, the measures have been, are or will be evaluated by the Netherlands Environmental Assessment Agency (see also 1.4, 2.4, 2.6 and 2.7).

3.6 Information on how biodiversity has been taken into account in programmes of overseas development assistance (ODA), scientific and technical cooperation and technology transfer

Dutch international cooperation supports the principles of the Paris Agenda to enhance harmonisation alignment and ownership. In joint consultation with the partner country,

sectors have been selected and sectoral support (ODA) was provided. Through these sector-wide programmes Dutch support to environment and biodiversity was mainstreamed in national sectoral budget lines. Some partner countries – notably Colombia, Ghana, Guatemala, Senegal, Pakistan, Surinam, Vietnam – did select environment or a natural resource (forestry, water management, agriculture/rural development) as a sector in which biodiversity was an integral part. In 2008, Dutch Development Cooperation supported 134 activities related to biodiversity (sector support, core funding, programmes, projects) that were implemented through multilateral organisations, non-governmental organizations and Dutch embassies. The total expenditure is around € 90 million per year. Within the Netherlands the Dutch government also promotes policy coherence through the policy plan "Biodiversity works: for nature, for people, for ever" (see 2.1) which links consumption in the Netherlands with sustainable trade chains to reduce the ecological footprint.

Particular attention has been paid to the integration of biodiversity in trade-related developments. A striking example is the Forest Law and Enforcement, Governance and Trade (FLEGT) initiative. In 2008 the Initiative for Sustainable Trade was launched in which business, non-governmental organisations and government work together to create sustainable production and trade chains on soy, timber, tea, cocoa, natural stone, tourism, cotton and aquaculture. The contribution totals € 31.128.000. Support has also been provided to innovative mechanisms to integrate biodiversity concerns into economy and finance. The intention is to create a demand and supply mechanism for environmental goods and services and related economic instruments thereby integrating biodiversity in our economic system. To achieve this, the Dutch government wants to enhance insight and create more value for biodiversity in economic production processes and meeting the needs of society; to actively support and initiate (inter)national initiatives; to influence international negotiations; and to 'green' and/or reform fiscal and subsidy schemes. The International Institute for Environment and Development (IIED) has researched and helped to improve the design and implementation of PES-schemes (Payment for Environmental Services) in for example Brazil, China, Costa Rica, Ecuador, India, Indonesia, the Philippines and South Africa. Other examples are support to the World-Wide Fund for Nature to pilot PES-schemes, and support to the REDD-initiative (Reducing Emissions from Deforestation and Forest Degradation). In support of the REDD-initiative the Netherlands contributes € 15 million for the period 2008-2012 to the Readiness Fund of the Forest Carbon Partnership Facility (FCPF) of the World Bank.

Chapter IV

Conclusions: progress towards the 2010 Target and implementation of the Strategic Plan

4.1 Progress towards the 2010 Target

See remarks in Table 1 ("Provisional framework of goals, targets and indicators to assess progress of the 2010 Biodiversity Target").

4.2 Progress towards the Goals and Objectives of the Strategic Plan of the Convention

See remarks in table 2 below entitled "Goals and objectives of the Strategic Plan and provisional indicators for assessing progress".

4.3 Conclusions

On basis of the various sources and information referred to in the remainder of the present report, we briefly conclude the following.

The Netherlands is among the most densely populated countries. In addition, the majority of its terrestrial area is covered by highly productive agricultural lands and pristine ecosystems are currently virtually absent in the Netherlands (see sources in 1.1). Consequently, when taking the early 20th century as a reference for the state of current biodiversity in this country, as is the case in some indicators in external evaluations of Dutch domestic nature policy (see e.g., 1.2), a relative unfavourable picture might emerge.

Nonetheless, ecological processes inevitably still do occur in the Netherlands, and, for example, animal species composition has not changed dramatically over the 20th century (Koomen *et al.* 1995). Furthermore, the Netherlands has spent much effort in safeguarding and restoring existing nature as well as in creating "new" nature. This has to result in the realization of a sound National Ecological Network (NEN) by around 2018. The NEN will also include many areas of particular importance that have been designated under the EU Birds Directive and Habitats Directive. Since 1990, realization of the NEN is the backbone of Dutch domestic nature policy and it provides new ecological opportunities for "old" species resulting in areas with high nature values. As such, the corresponding targets are in line with several CBD targets on protected areas (see e.g, 2.2, 2.8, 3.3, 4.2, Appendix III-B). The NEN areas also increasingly represent a variety of economic values, for example, when taking important ecosystem services, including recreational opportunities into account. Further, current biodiversity policy also addresses an advise of the *Deltacommissie* to combine nature and water management efforts for the sake of climate adaptation (see 2.2).

The Netherlands has also a sophisticated level of collecting and processing biodiversity data. Due to this, the Netherlands is amongst the nations with the first and most comprehensive online national species catalogues (see 1.1). In 2010 the Netherlands Centre for Biodiversity Naturalis has also been launched. This centre combines the efforts of several Dutch taxonomic institutes (see 2.2). Further, the Netherlands has also

published a relative large number of national red lists (see 1.1, 1.2). Although the lists do reflect unfavourable trends regarding species, they also show a high level of knowledge about the national biodiversity, particularly among thousands of volunteers participating in nature survey NGOs (*Particuliere Gegevensbeherende Organisaties*).

Further, regarding biodiversity outside the Netherlands, the Dutch government also spends substantial amounts of development assistance on initiatives contributing to the sustainable use of biodiversity (see e.g., 2.2, 2.8, 3.6, 4.1, 4.2).

Nonetheless, even compared to more recent references (e.g., 1950 or 1982), many species populations in the Netherlands have declined or are further declining (see 1.2). Factors considered to have contributed to the long-term decline (i.e., over the 20th century) of populations of animal species include large-scale hydraulic works, organic pollution and salinization, the disappearance of eelgrass beds in the Wadden Sea, straightening of water coarses, reclaiming of heathlands and grasslands as well as the subsequent acidification, eutrophication and desiccation of these lands, and the disappearance of flowery areas (Koomen *et al.* 1995) (see 1.3). Factors considered to have been involved in the long-term decline (i.e., over the 20th century) of plant species (including lichens, algae and macrofungi) include air pollution, nitrogen deposition, habitat destruction (including of heathlands, grasslands, moors and dunes), the disappearance of eelgrass beds in the Wadden Sea, increased water temperatures, acidification and eutrophication of waters, and decreased vitality of forests (Van der Meijden *et al.* 1995) (see 1.3).

Particularly during the late sixties and seventies, societal and political concern with environmental issues has grown and the Netherlands has developed a considerable body of spatial, environmental and nature legislation and policy since then (for recent policy regarding biodiversity, see 2.1). Part of the legislation and policy aims at implementing international treaties, such as the CBD, and EU regulations. In short, the variety of measures has had inhibiting effects on biodiversity decline (see sources in 1.3, 1.4), although several targets, notably regarding the realization of the NEN and the reduction of nitrogen emissions and depositions, still remain challenging (see e.g., 1.2, 1.3, 1.4, 2.2, 4.1), including with reference to CBD targets.

In addition, concern with biodiversity outside the Netherlands has increased and corresponding policy focuses on realizing more sustainable international trade and production chains to facilitate the integration of social and ecological conditions and promote the production and trade of sustainable products. The Netherlands also stimulates the development of financial mechanisms that assign economic values to ecosystem services, which also contributes to ecosystem preservation (see, e.g., 2.1, 2.2, 4.1).

Another challenge is enhancing public awareness and concern regarding biodiversity (see 2.2). To meet this challenge, current biodiversity policy (see 2.1) increasingly emphasizes functional values of biodiversity rather than expressing the more traditional concern about the conservation status of individual species.

Although not for all CBD targets and issues information could be provided in the present report, including on policy efforts and progress (e.g., in 4.1), our overall impression is that at least the various policy efforts in the Netherlands may be regarded as being to a large extent in line with the various actions of the CBD and COP decisions.

Table 1 Provisional framework of goals, targets and indicators to assess progress of the 2010 Biodiversity Target

Goals and targets	Relevant indicators	Remarks
Protect the components of biodiversity		
Goal 1. Promote the conservation of the biological diversity of ecosystems, habitats and biomes		
Target 1.1: At least 10% of each of the world's ecological regions effectively conserved.	- *Coverage of protected areas*	- *National targets:* the establishment of a National Ecological Network (NEN) which also includes EU Natura 2000 areas (see also 2.1, under art. 8a); - *Incorporation in other sectors*: by means of national, provincial and community level spatial planning instruments; - *Progress made towards targets*: for the NEN, see progress reports referred to in 2.4; see also 1.1, under "Trends regarding ecosystems and habitats in the Netherlands"; - *Indicators used for progress*: for the NEN: an indicator is used in the National Budget (see 2.1., under art. 8a) as well as by the Netherlands Environmental Assessment Agency [NEAA] (see Figure 4, 12 and 13 and also Melman & Willemen (2007)); in addition, see also the progress reports referred to in 2.4; for Natura 2000 areas in particular, progress is reported in periodical reports to the European Commission; for progress figures of all EU Member States, including the Netherlands, see also the EU Natura 2000 barometer (<http://ec.europa.eu/environment/nature/natura2000/barometer/index_en.htm>) - *Obstacles encountered*: for the NEN: (a) the purchasing and "arranging" of new areas as building blocks for the NEN has slowed down; underlying obstacles include the price of land and the voluntariness of sales: most agricultural land is highly productive while only low productive land is easy to purchase as building blocks for the NEN; (b) the participation in private nature management of NEN areas also lags behind; underlying obstacles include that nature development by private land owners doesn't fit in agricultural strategies; consequently, the process is long-lasting; other obstacles having been reported include lack of knowledge, incomplete information and lack of confidence in the government (Planbureau voor de Leefomgeving 2009a).

Goals and targets	Relevant indicators	Remarks
	- *Trends in extent of selected biomes, ecosystems and habitats*	- *National targets*: for the NEN: "nature quality" targets had been set by provincial governments, but are currently being revised; for EU Natura 2000 sites, targets have been set for so-called "habitat types"; - *Incorporation in other sectors*: for the NEN: besides private nature management organizations, also farmers participate in the management of certain NEN areas; for Natura 2000 areas in particular: regulation of activities by other sectors by means of Environmental Impact Assessments and permits under the Nature Conservation Act 1998; - *Progress made towards targets*: for the NEN: new "nature quality" targets have to be set first (see above); for Natura 2000 areas in particular: although little improvement has been made during the last decade, still only a minority of habitat types is in a favourable status (see figure 5). - *Indicators used for progress*: for the NEN: new "nature quality" targets have to be set first; for Natura 2000 areas in particular: progress is reported in periodical reports to the European Commission; See further also Figure 5, 14 and 15; - *Obstacles encountered*: for the NEN and Natura 2000 areas in particular, environmental and spatial conditions are currently an obstacle for achieving favourable conditions of several habitats; this is partly the result of the absence of natural (i.e., hydrological and geomorphological) dynamics in many areas (Planbureau voor de Leefomgeving 2009a).

Goals and targets	Relevant indicators	Remarks
	- *Trends in abundance and distribution of selected species*	- *National targets*: according to the document "Nature for people, people for nature" (see 2.1) and subsequent documents, the main target regarding species in the Netherlands is the following: '*By 2020 conditions will be in place for the long-term conservation of all species and populations native to the Netherlands occurring in 1982*'; within the EU Natura 2000 framework, targets have also been set for the preservation of specific species or species groups. - *Incorporation in other sectors*: several sectors have made codes of conduct to regulate activities which may harm species which are protected under the Flora and Fauna Act 1998; for the role of sectors in area-based conservation (which should substantially contribute to reaching the target), see above; further, sectors including water boards, farmers and nature management organizations participate in the "The habitat-based approach" for species (see 2.1). In addition, environmental and spatial policy, defragmentation policy, fisheries policy, etc. should also contribute to reaching the target and affects many different sectors. - Progress made towards targets: although the total area of protected areas is increasing, national red lists of threatened species have increased in length and many species have become more endangered; - *Indicators used for progress*: both the National Budget and the NEAA use indicators based on changes in the red list status of species (see 1.2, under 'Trends in species numbers and species' populations in the Netherlands'). - *Obstacles encountered*: these include unfavourable spatial and environmental conditions, including hydrological and nitrogen conditions, particularly in species' habitats and suboptimal designation of NEN areas; unfavourable conditions are often the result of intensive use of agricultural land surrounding nature areas due to which biodiversity is increasingly withdrawn into reserves; other underlying obstacles include the absence of natural (hydrological and geomorphological) dynamics in several areas, the homogenization of ecosystems (i.e., soil, water and management variation and decrease of gradients) and climate change (Planbureau voor de Leefomgeving 2009a).
Target 1.2: Areas of particular importance to biodiversity protected	*Trends in extent of selected biomes, ecosystems and habitats*	At least EU Natura 2000 sites are of particular importance both at the national and the EU level. See further the remarks under Target 1.1.
	Trends in abundance and distribution of selected species	At least EU Natura 2000 sites are of particular importance both at the national and the EU level. See further the remarks under Target 1.1.
	Coverage of protected areas	At least EU Natura 2000 sites are of particular importance both at the national and the EU level. See further the remarks under Target 1.1.

Goals and targets	Relevant indicators	Remarks
Goal 2. Promote the conservation of species diversity		
Target 2.1: Restore, maintain, or reduce the decline of populations of species of selected taxonomic groups.	*Trends in abundance and distribution of selected species*	See remarks under Target 1.1.
	Change in status of threatened species	See remarks under Target 1.1.
Target 2.2: Status of threatened species improved.	*Change in status of threatened species*	See remarks under Target 1.1.
	Trends in abundance and distribution of selected species	See remarks under Target 1.1.
	Coverage of protected areas	See remarks under Target 1.1.
Goal 3. Promote the conservation of genetic diversity		
Target 3.1: Genetic diversity of crops, livestock, and of harvested species of trees, fish and wildlife and other valuable species conserved, and associated indigenous and local knowledge maintained.	*Trends in genetic diversity of domesticated animals, cultivated plants, and fish species of major socio-economic importance*	- *National targets:* according to the document "Sources of our existence" (see 2.1): conservation and the sustainable use of genetic diversity implementing the main objectives stated in the CBD: (a) Conservation and sustainable use of genetic resources; (b) Fair distribution of the benefits resulting from their use. - *Incorporation in other sectors:* efforts of 4 major research institutes and the participation in a platform by the agro-food and biotechnology sector; - *Progress made towards targets:* significant progress has been made in the establishment of assessable gene banks for plants, animals and shrubs and trees as well as in the development of genetic knowledge; - *Indicators used for progress:* see Figure 1 and Van Veen *et al.* (2008, p. 4); See also Windig *et al.* (2007). - *Obstacles encountered:* no major obstacles in the execution of the document; however, productivity is seen as a driving force in the decrease of genetic diversity in domesticated breeds; for example, in artificial insemination, selection is often based on productivity characteristics.
	Biodiversity used in food and medicine (indicator under development)	-
	Trends in abundance and distribution of selected species	-

Goals and targets	Relevant indicators	Remarks
Promote sustainable use		
Goal 4. Promote sustainable use and consumption.		
Target 4.1: Biodiversity-based products derived from sources that are sustainably managed, and production areas managed consistent with the conservation of biodiversity.	*Area of forest, agricultural and aquaculture ecosystems under sustainable management*	- *National targets:* for forestry and agriculture: see 2.2. under 'Thematic Programmes of the CBD' and 3.1; - *Progress made towards targets:* -; • forestry: the area of forests has expanded and management is often based on multifunctional targets; • agriculture: the useful application of biodiversity in agriculture has been promoted by means of the EU-learning network FAB (functional agrobiodiversity (see: <http://www.eln-fab.eu/>) and national programmes FAB en Spade (national programme for knowledge transfer (see: <http://www.spade.nl/>)); • aquaculture: -; - *Indicators used for progress:* see Van Veen *et al.* (2008, p. 8-9); for indicators regarding forestry and agriculture, see also 2.2. under 'Thematic Programmes of the CBD'; - *Obstacles encountered:* • forestry: the natural character of Dutch forests is limited, because the greatest part (80 %) of Dutch forests consists of standing forest of which 82 % is even-aged (Dirkse *et al.* 2006); in addition: high costs of labour are an obstacle in forest management; • agriculture: environmental pressure of agriculture on natural biodiversity by unfavourable hydrological management (desiccation) and high nitrogen levels; • aquaculture: -.
	Proportion of products derived from sustainable sources (indicator under development)	- *Incorporation in other sectors:* 'biodiversity' is an explicit theme in the initiative Corporate Social Responsibility (*Maatschappelijk Verantwoord Ondernemen*) (see: <http://www.mvonederland.nl/english/whatscsr/themes>; - *Progress made towards targets:* Outlooks predict that the ecological footprint area will further increase, showing a continuing impact of Dutch consumption on global biodiversity; - *Indicators used for progress:* Figure 16 and Van Veen *et al.* (2008, p. 9); - *Obstacles encountered:* unsustainable consumption patterns, low prices of unsustainable products; enhancing the awareness and knowledge of consumers also remains a challenge.
	Trends in abundance and distribution of selected species	- *National targets:* for species subject to sea fisheries, see 3.1; in addition: multi-year management plans are in place for certain fish populations; for game species the Flora and Fauna Act 1998 regulates sustainable use of their populations by recreational hunters;

Goals and targets	Relevant indicators	Remarks
		- *Indicators used for progress:* • for various indicators on Dutch fisheries related to biodiversity, see: < http://www.compendiumvoordeleefomgeving.nl/dossiers/nl0131-visserij.html?i=33-110 > (in Dutch); • for sea fisheries in particular, see also international statistics of the FAO and ICES; • for freshwater fishery and for hunting: species subject to this use are also included in national fisheries and hunting statistics as well as in population trend monitoring (i.e., for birds, mammals) and red lists (i.e., for fresh water fish, birds, mammals) (see 1.2); - *Obstacles encountered:* the use of bottom touching gear and discards as well as unsustainable yields in commercial fishing.
	Marine trophic index	- *National targets:* for fisheries, see the previous row in this table; - *Indicators used for progress:* • for fisheries-related indicators, see previous row in this table; • MTI: currently no MTI indicator in use; see also Fey-Hofstede & Meesters (2007) and Meesters *et al.* (2009).
	Nitrogen deposition	- *National targets:* documents in which nitrogen emission and deposition targets have been set with relevance for domestic policy include: the UN-ECE Convention on Long-Range Transboundary Air Pollution – Gothenburg Protocol (Protocol to Abate Acidification, Eutrophication and Ground-level Ozone) the EU National Emissions Ceilings Directive, the EU Air Quality Directive, the fourth National Environmental Policy Plan (see 2.1), the national policy note '*Erop of eronder: Uitvoeringsnotitie emissieplafonds verzuring en grootschalige luchtverontreiniging 2003*'; further, for nature areas local nitrogen targets have been set within the framework of the *Investieringsbudget Landelijk Gebied* (ILG); see further, e.g.: • <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl0182-Verzuring-en-grootschalige-luchtverontreiniging%3A-beleid.html?i=11-60> (in Dutch); • <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl1524-ILG-taakstelling-atmosferische-depositie.html?i=17-108> (in Dutch); The Netherlands has the obligation to realize sustainable levels of N deposition in EU Natura 2000 areas. The overall goal in the Netherlands for 2030 is: 95% of the nature area will be protected (see: the fourth National Environmental Policy Plan, p.84 (see 2.1)) - *Incorporation in other sectors:* policies concern several sectors, including agriculture, transportation and industry; - *Progress made towards targets:* environmental conditions have improved as a result from

Goals and targets	Relevant indicators	Remarks
		environmental policy, however, nitrogen levels are still too high when considering several policy targets set including for reaching favourable conditions for biodiversity in many areas; - *Indicators used for progress:* see figure 7 and 8 and Van Veen *et al.* (2008, p. 6 and 8); - *Obstacles encountered:* high agricultural productivity, including from diary farms; the existence of many small sources of nitrogen emissions; the feasibility of conceivable measures is often limited due to the considerable social and economical impact the measure would have (Planbureau voor de Leefomgeving 2009a).
	Water quality in aquatic ecosystems	- *National targets:* for inland waters, see 2.2, under 'Thematic Programmes of the CBD'; - *Indicators used for progress:* see, e.g. Fig. 7 as well as the following indicator for the ecological quality of inland waters: <http://www.compendiumvoordeleefomgeving.nl/indicatoren/nl1438-Ecologische-kwaliteit-waterlichamen.html?i=2-76> (in Dutch); - *Obstacles encountered:* for inland waters: nitrogen and phosphor pollution, unfavourable spatial arrangement of watercourses and physical properties of banks and shores, ecological fragmentation due to pumping-stations and dams, peak loads of pesticides, lack of natural hydrological dynamics.
Target 4.2: Unsustainable consumption, of biological resources, or that impacts upon biodiversity, reduced.	*Ecological footprint and related concepts*	- *National targets:* see the document "Biodiversity works: for nature, for people, for ever: the biodiversity policy programme of the Netherlands 2008-2011" (see 2.1); - *Progress made towards targets:* progress in reducing the biodiversity loss in the national footprint abroad by making product chains more sustainable is slow (Planbureau voor de Leefomgeving 2009a). - *Indicators used for progress:* see Figure 16; - *Obstacles encountered:* unsustainable consumption patterns; further, the ability of the Dutch Government to influence foreign suppliers of raw materials to produce in a more sustainable way is limited due to competing international forces (Planbureau voor de Leefomgeving 2009a).
Target 4.3: No species of wild flora or fauna endangered by international trade.	*Change in status of threatened species*	- *National targets*: implementation of (EU) CITES regulations; - *Incorporation in other sectors*: in trade; - Progress made towards targets: (EU) CITES regulations have been successfully implemented and enforcement is in place; - *Obstacles encountered*: no major obstacles.
Address threats to biodiversity		
Goal 5. Pressures from habitat loss, land use change and degradation, and unsustainable water use, reduced.		

Goals and targets	Relevant indicators	Remarks
Target 5.1. Rate of loss and degradation of natural habitats decreased.	*Trends in extent of selected biomes, ecosystems and habitats*	- *National targets*: see remarks under Target 1.1; - *Incorporation in other sectors*: see remarks under Target 1.1; - *Progress made towards targets*: see remarks under Target 1.1; - *Indicators used for progress*: see Figure 6; - *Obstacles encountered*: see remarks under Target 1.1.
	Trends in abundance and distribution of selected species	- *National targets*: see remarks under Target 1.1; - *Incorporation in other sectors*: see remarks under Target 1.1; - *Progress made towards targets*: see remarks under Target 1.1; - *Indicators used for progress*: see remarks under Target 1.1; - *Obstacles encountered*: see remarks under Target 1.1.
	Marine trophic index	- *Indicators used for progress:* currently no MTI indicator in use; see also Fey-Hofstede & Meesters (2007) and Meesters *et al.* (2009).
Goal 6. Control threats from invasive alien species		
Target 6.1. Pathways for major potential alien invasive species controlled.	*Trends in invasive alien species*	- *National targets:* see "Policy Note on Invasive Alien Species" (see 2.1); - *Incorporation in other sectors:* see "Policy Note on Invasive Alien Species" (see 2.1); involved sectors include water boards; pet selling sector, seed sector, water plant sector, nature management organizations. - *Progress made towards targets:* policy formulation and execution has only started recently; the number of alien animal species in the Netherlands has doubled since 1900; since 1500, about 233 alien plant species have established, now making up about 16% of all plant species in the Netherlands (Compendium voor de Leefomgeving); - *Indicators used for progress:* see 2.2, under CBD articles, article 8h; - Obstacles encountered: the construction of new water connections in Europe (notably, the Danube-Rhine canal) and international transport routes.
Target 6. 2. Management plans in place for major alien species that threaten ecosystems, habitats or species.	*Trends in invasive alien species*	- *National targets:* for a few alien species, specific management plans are in preparation; - *Incorporation in other sectors:* sectors involved include nature management organizations and zoos; - *Progress made towards targets:* plans are in preparation; - *Indicators used for progress:* see 2.2, under 'CBD articles', 'article 8h'; - *Obstacles encountered:* societal concern for animal welfare in relation to proposed management measures; practical feasibility of conceivable measures once invasive alien species have settled. .

Goal 7. Address challenges to biodiversity from climate change, and pollution		
Target 7.1. Maintain and enhance resilience of the components of biodiversity to adapt to climate change.	*Connectivity/fragmentation of ecosystems*	- *National targets:* targets include the realization of a National Ecological Network (see remarks under Target 1.1) as well as have been set in the "Multi-year Programme on Defragmentation" (see 2.1); further, the "Biodiversity implementation programme" (see 2.1) addresses the advice of the *Deltacommissie* to combine nature and water management efforts for the sake of climate adaptation (see 2.2, under cross-cutting issues, under climate change and biodiversity); - *Incorporation in other sectors:* for the NEN, see remarks under Target 1.1; for the defragementation programme, the ministry of Transport, Public Works and Water Management is the key player in relation to its responsibility for infrastructure; - *Progress made towards targets:* for the NEN, see remarks under Target 1.1; for the defragementation programme, see the annual reports referred to in 2.1; - *Indicators used for progress:* see Figure 9; see also Reijnen 2007b; - *Obstacles encountered:* for the NEN, see remarks under Target 1.1; for the defragementation programme.
Target 7.2. Reduce pollution and its impacts on biodiversity.	*Nitrogen deposition*	- *National targets:* see above under Target 4.1; - *Incorporation in other sectors:* see above under Target 4.1; - *Progress made towards targets:* see above under Target 4.1; - *Indicators used for progress:* see above under Target 4.1; - *Obstacles encountered:* see above under Target 4.1.
	Water quality in aquatic ecosystems	- *National targets:* see above under Target 4.1; - *Incorporation in other sectors:* see above under Target 4.1; - *Progress made towards targets:* see above under Target 4.1; - *Indicators used for progress:* see above under Target 4.1; - *Obstacles encountered:* see above under Target 4.1.
Maintain goods and services from biodiversity to support human well-being		
Goal 8. Maintain capacity of ecosystems to deliver goods and services and support livelihoods		
Target 8.1. Capacity of ecosystems to deliver goods and services maintained.	*Biodiversity used in food and medicine (indicator under development)*	-
	Water quality in aquatic ecosystems	- *National targets:* see remarks under Target 4.1; - *Incorporation in other sectors:* see remarks under Target 4.1; - *Progress made towards targets:* see remarks under Target 4.1;

		- *Indicators used for progress:* see remarks under Target 4.1; - *Obstacles encountered:* see remarks under Target 4.1.
	Marine trophic index	- *National targets*: for marine areas, see 2.2, under 'Thematic Programmes of the CBD': 'Marine and Coastal Biodiversity' and for marine fisheries, see 3.1; - *Indicators used for progress:* currently no MTI indicator in use; see also Fey-Hofstede & Meesters (2007) and Meesters *et al.* (2009).
	Incidence of Human-induced ecosystem failure	-
Target 8.2. Biological resources that support sustainable livelihoods, local food security and health care, especially of poor people maintained.	*Health and well-being of communities who depend directly on local ecosystem goods and services*	- *National targets:* international policy: the Netherlands has no specific targets regarding this issue; - *Incorporation in other sectors:* domestic policy: promotion of the useful application of ecosystem services in cities and rural areas; international policy: all projects related to biodiversity are also related to MDG 1 and as such focusing on sustainable use of biological resources; support is presented under target 11.1; - *Progress made towards targets:* domestic policy: several biodiversity action plans and projects in rural and urban areas regarding the useful application of biodiversity; international policy: progress is the responsibility of partner countries.
	Biodiversity used in food and medicine	- *Progress made towards targets:* the Netherlands has supported the PROTA project on useful plants including for food and medicine in Africa; see: <http://www.prota.org/uk/About+PROTA/Home.htm>.
Protect traditional knowledge, innovations and practices		
Goal 9 Maintain socio-cultural diversity of indigenous and local communities		
Target 9.1. Protect traditional knowledge, innovations and practices.	*Status and trends of linguistic diversity and numbers of speakers of indigenous languages*	In its biodiversity policy, the Netherlands does not have specific targets on this issue; protection of traditional knowledge is integrated in all projects that are targeting communities and indigenous peoples on a local level; see also Goal 4.3.
	Additional indicators to be developed	-

Target 9.2. Protect the rights of indigenous and local communities over their traditional knowledge, innovations and practices, including their rights to benefit-sharing.	*Indicator to be developed*	In its biodiversity policy, the Netherlands does not have specific targets on this issue; protection of rights is integrated in all projects that are targeting communities and indigenous peoples on a local level; see also Goal 4.3.
Ensure the fair and equitable sharing of benefits arising out of the use of genetic resources		
Goal 10. Ensure the fair and equitable sharing of benefits arising out of the use of genetic resources		
Target 10.1. All access to genetic resources is in line with the Convention on Biological Diversity and its relevant provisions.	*Indicator to be developed*	-
Target 10.2. Benefits arising from the commercial and other utilization of genetic resources shared in a fair and equitable way with the countries providing such resources in line with the Convention on Biological Diversity and its relevant provisions	*Indicator to be developed*	-

Ensure provision of adequate resources		
Goal 11: Parties have improved financial, human, scientific, technical and technological capacity to implement the Convention		
Target 11.1. New and additional financial resources are transferred to developing country Parties, to allow for the effective implementation of their commitments under the Convention, in accordance with Article 20.	*Official development assistance provided in support of the Convention*	- *National targets:* no specific targets; - *Incorporation in other sectors:* Dutch international cooperation supports the principles of the Paris Agenda to enhance harmonisation alignment and ownership. In joint consultation with the partner country, sectors have been selected and sectoral support (ODA) was provided. Through these sector-wide programmes Dutch support to environment and biodiversity was mainstreamed in national sectoral budget lines; - *Progress made towards targets:* in 2008, Dutch Development Cooperation supported 134 activities related to biodiversity (sector support, core funding, programmes, projects) that were implemented through multilateral organisations, non-governmental organizations and Dutch embassies; total expenditure is around € 90 million per year; - *Obstacles encountered:* the sector environment is not often selected for support.
Target 11.2. Technology is transferred to developing country Parties, to allow for the effective implementation of their commitments under the Convention, in accordance with its Article 20, paragraph 4.	*Indicator to be developed*	- *National targets:* no specific targets; - *Incorporation in other sectors:* to facilitate access and transfer of technology the Netherlands – under ODA – also supports various scientific institutions of the CGIAR (Consultative Group on International Agricultural Research with €7.5 million per year (Bioversity, CIFOR, ICARDA, ICRAF, IFPRI, IWMI and some CG-wide activities); the Netherlands Environmental Asessment Agency has been supported to implement strategic policy analysis in the field of environment, nature and spatial planning; it assisted various international and multilateral organisations. With UNEP a global biodiversity assessment model was created; the model was used in global studies, such as the OECD Environmental Outlook, GEO4 and TEEB; the Agency also published a report for the Club of Rome Global Assembly in 2009 called 'Growing within Limits".

Table 2 goals and objectives of the Strategic Plan and provisional indicators for assessing progress

Strategic goals and objectives	Possible indicators	Remarks
Goal 1: The Convention is fulfilling its leadership role in international biodiversity issues.		
1.1 The Convention is setting the global biodiversity agenda.	CBD provisions, COP decisions and 2010 target reflected in work plans of major international forums	Comments in relation to Goal 1.1, 1.2 and 1.3: 1. This should be seen as a two-way process: Parties, international bodies etc. also contribute "bottom-up'to the formulation of the global agenda and implementation 2. We consider the promotion of cooperation with and support of other instruments and processes (outreach, partnerships) as a crucial condition for achieving the CBD objectives.
1.2 The Convention is promoting cooperation between all relevant international instruments and processes to enhance policy coherence.		
1.3 Other international processes are actively supporting implementation of the Convention, in a manner consistent with their respective frameworks.		
1.4 The Cartagena Protocol on Biosafety is widely implemented.		
1.5 Biodiversity concerns are being integrated into relevant sectoral or cross-sectoral plans, programmes and policies at the regional and global levels.	*Possible indicator to be developed:* *Number of regional/global plans, programmes and policies which specifically address the integration of biodiversity concerns into relevant sectoral or cross-sectoral plans, programmes and policies* *Application of planning tools such as strategic environmental assessment to assess the degree to which biodiversity concerns are being integrated* *Biodiversity integrated into the criteria of multilateral donors and regional development banks*	We find it important to create cohesion and interaction between the plans and policies as well as the indicators on global, regional and national levels. Degree of integration into criteria and objectives of financial institutions, as well as other parts of private sector, is indeed an important indicator.

Strategic goals and objectives	Possible indicators	Remarks
1.6 Parties are collaborating at the regional and subregional levels to implement the Convention.	*Possible indicator to be developed: Number of Parties that are part of (sub-) regional biodiversity-related agreements*	
Goal 2: Parties have improved financial, human, scientific, technical, and technological capacity to implement the Convention.		
2.1 All Parties have adequate capacity for implementation of priority actions in national biodiversity strategy and action plans.		"Adequate capacity" needs to be further operationalized as an indicator.
2.2 Developing country Parties, in particular the least developed and the small island developing States amongst them, and other Parties with economies in transition, have sufficient resources available to implement the three objectives of the Convention.	Official development assistance provided in support of the Convention (OECD-DAC Statistics Committee)	The Netherlands supports the Global Environment Facility (GEF) through which the implementation of national programmes is supported. Under GEF-4 the Netherlands contributed € 22.25 million per year (The Netherlands aims at 3.3% of total GEF funds), of which one-third is spent for biodiversity activities. Further, the Netherlands is contributes substantially to CBD implementation through ODA and also provides bilateral support to the CBD-secretariat.
2.3 Developing country Parties, in particular the least developed and the small island developing States amongst them, and other Parties with economies in transition, have increased resources and technology transfer available to implement the Cartagena Protocol on Biosafety.		See remarks under Goal 2.1.
2.4 All Parties have adequate capacity to implement the Cartagena Protocol on Biosafety.		
2.5 Technical and scientific cooperation is making a significant contribution to building capacity.	*Indicator to be developed consistent with VII/30*	
Goal 3: National biodiversity strategies and action plans and the integration of biodiversity concerns into relevant sectors serve as an effective framework for the implementation of the objectives of the Convention.		
3.1 Every Party has effective national strategies, plans and programmes in place to provide a national framework for implementing the three objectives of the Convention and to set clear national	Number of Parties with national biodiversity strategies	The issue is to create effective strategies and plans. The indicator should measure the degree of operationalisation.

Strategic goals and objectives	Possible indicators	Remarks
priorities.		
3.2 Every Party to the Cartagena Protocol on Biosafety has a regulatory framework in place and functioning to implement the Protocol.		
3.3 Biodiversity concerns are being integrated into relevant national sectoral and cross-sectoral plans, programmes and policies.	*To be developed* *Percentage of Parties with relevant national sectoral and cross-sectoral plans, programmes and policies in which biodiversity concerns are integrated*	Suggestion: identify 15-20 most important sectoral plans/policies, and measure to which degree each Party has integrated biodiversity into these.
3.4 The priorities in national biodiversity strategies and action plans are being actively implemented, as a means to achieve national implementation of the Convention, and as a significant contribution towards the global biodiversity agenda.	*To be developed* *Number of national biodiversity strategies and action plans that are being actively implemented*	See remarks under Goal 3.1.
Goal 4: There is a better understanding of the importance of biodiversity and of the Convention, and this has led to broader engagement across society in implementation.		
4.1 All Parties are implementing a communication, education, and public awareness strategy and promoting public participation in support of the Convention.	*Possible indicator to be developed:* *Number of Parties implementing a communication, education and public awareness strategy and promoting public participation* *Percentage of public awareness programmes/projects about the importance of biodiversity* *Percentage of Parties with biodiversity on their public school curricula*	A broad strategy for governmental biodiversity communication for the short and mid term has been in place since 2008. This strategy is based on extensive policy and social analyses and translates CBD and national policies into implementation programmes. Regarding the indicator to be devloped, it may be considered to use *the percentage of the population that is effectively reached by programmes/projects.*
4.2 Every Party to the Cartagena Protocol on Biosafety is promoting and facilitating public awareness, education and participation in support of the Protocol.		
4.3 Indigenous and local communities are effectively involved in implementation and in the processes of the Convention, at national, regional and international levels.	*To be developed by the Ad Hoc Open-ended Working Group on Article 8(j)*	Through a support Fund – coordinated by the Dutch NGOs Hivos and Oxfam-Novib – the Netherlands has contributed to various international and national organisations, some of which directly worked with indigenous communities or

Strategic goals and objectives	Possible indicators	Remarks
		integrated them in broader programmes. In addition, NGOs implemented activities that focused on poverty and environment under the Co-Financing System (MFS). Those Programmes often included support to indigenous and local communities to strengthen their rights and facilitate participation in decision-making. Core-support was also provided to the regional organisation Amazon Cooperation Treaty Organization (ACTO), who stimulates and deepens the regional political dialogue on the recognition and protection of land and territories rights of indigenous people and other tribal communities of the region. The Netherlands has continued to support the International Tropical and Timber Organisation (ITTO) whereby biodiversity services and the need of local users are essential for sustainable forest management.
4.4 Key actors and stakeholders, including the private sector, are engaged in partnership to implement the Convention and are integrating biodiversity concerns into their relevant sectoral and cross-sectoral plans, programmes and policies.	*To be developed* *Indicator targeting private sector engagement,* *e.g. Voluntary type 2 partnerships in support of the implementation of the Convention*	See also the remarks under Goal 1.5; it is likely to be an important indicator for measuring the implementation.

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Appendix I Information concerning reporting Party and preparation of national report

A. Reporting Party

Contracting Party	
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SUBMISSION	
Signature of officer responsible for submitting national report	
Date of submission	

B. Process of preparation of national report

On the basis of input obtained from policy makers from several ministries as well as from the Netherlands Environmental Assessment Agency (NEAA), a draft report was prepared. Comments on the draft version were subsequently provided by ministerial policy makers, NEAA employees, Dutch CBD focal points and member organizations of the National Committee of the Netherlands of the IUCN. Finally, a second draft has been evaluated and approved by the inter-ministerial Coordination Commission on Environmental Policy (*CIM-Bio*) under the supervision of the ministry of Foreign Affairs.

Appendix II Further sources of information

See the various sources referred to in the previous text as well as in the references section above.

Appendix III Progress towards Targets of the Global Strategy for Plant Conservation and the Programme of Work on Protected Areas

A. Progress towards Targets of the Global Strategy for Plant Conservation

See 2.2., under Cross-cutting Issues of the CBD.

B. Progress towards Targets of the Programme of Work on Protected Areas

See the table below.

Progress towards Targets of the Programme of Work on Protected Areas

Goals	Target	Progress
1.1. To establish and strengthen national and regional systems of protected areas integrated into a global network as a contribution to globally agreed goals.	By 2010, terrestrially (includes inland water ecosystems) and 2012 in the marine area, a global network of comprehensive, representative and effectively managed national and regional protected area system is established as a contribution to (i) the goal of the Strategic Plan of the Convention and the World Summit on Sustainable Development of achieving a significant reduction in the rate of biodiversity loss by 2010; (ii) the Millennium Development Goals – particularly goal 7 on ensuring environmental sustainability; and (iii) the Global Strategy for Plant Conservation	The National Ecological Network (NEN) is planned to be complete in 2018, but is realized for 83.12% in 2008. The Natura 2000 Network will be realised in 2010/2012. i. The rate of biodiversity loss has significantly decreased, but is not expected to be stopped completely. (See the Nature Balance in 1.4) ii. The NEN is contributing tot the Environmental sustainability in the Netherlands. iii. The NEN and the Nature 2000 Network make a solid contribution to Plant Conservation.
1.2. To integrate protected areas into broader land- and seascapes and sectors so as to maintain ecological structure and function.	By 2015, all protected areas and protected area systems are integrated into the wider land- and seascape, and relevant sectors, by applying the ecosystem approach and taking into account ecological connectivity (the concept of connectivity may not be applicable to all Parties) and the concept, where appropriate, of ecological networks.	For the Nature 2000 Network this will be realized in 2013, when managementplans for all sites are operationable. The NEN is planned to be completed in 2018.
1.3. To establish and strengthen regional networks, transboundary protected areas (TBPAs) and collaboration between neighbouring protected areas across national boundaries.	Establish and strengthen by 2010/2012 (references to marine protected area networks to be consistent with the target in the WSSD plan of implementation) transboundary protected areas, other forms of collaboration between neighbouring protected areas across national boundaries and regional networks, to enhance the conservation and sustainable use of biological diversity, implementing the ecosystem approach, and improving international cooperation	See under Goal 1.1 and 1.2.
1.4. To substantially improve site-based protected area planning and management.	All protected areas to have effective management in existence by 2012, using participatory and science-based site planning processes that incorporate clear biodiversity objectives, targets, management strategies and monitoring programmes, drawing upon existing methodologies and a long-term management plan with active stakeholder involvement	See under Goal 1.1 and 1.2.
1.5. To prevent and mitigate the negative impacts of key threats to protected areas.	By 2008, effective mechanisms for identifying and preventing, and/or mitigating the negative impacts of key threats to protected areas are in place.	Ecological and environmental monitoring systems are operationable. Prevention, mitigation and enforcement are legally embedded in the Nature Conservation Act 1998 and the Flora and Fauna Act 1998.

Goals	Target	Progress
2.1. To promote equity and benefit-sharing.	Establish by 2008 mechanisms for the equitable sharing of both costs and benefits arising from the establishment and management of protected areas	
2.2. To enhance and secure involvement of indigenous and local communities and relevant stakeholders.	Full and effective participation by 2008, of indigenous and local communities, in full respect of their rights and recognition of their responsibilities, consistent with national law and applicable international obligations, and the participation of relevant stakeholders, in the management of existing, and the establishment and management of new, protected areas	For the Natura 2000 Network this will be realized in 2013. For the NEN in 2018.
3.1. To provide an enabling policy, institutional and socio-economic environment for protected areas.	By 2008 review and revise policies as appropriate, including use of social and economic valuation and incentives, to provide a supportive enabling environment for more effective establishment and management of protected areas and protected areas systems.	This will be realized by operationable policies and legislation and the Natura 2000 management plans.
3.2. To build capacity for the planning, establishment and management of protected areas .	By 2010, comprehensive capacity-building programmes and initiatives are implemented to develop knowledge and skills at individual, community and institutional levels, and raise professional standards	Realized.
3.3. To develop, apply and transfer appropriate technologies for protected areas.	By 2010 the development, validation, and transfer of appropriate technologies and innovative approaches for the effective management of protected areas is substantially improved, taking into account decisions of the Conference of the Parties on technology transfer and cooperation.	Realized. Further development and innovation is pursued.
3.4. To ensure financial sustainability of protected areas and national and regional systems of protected areas.	By 2008, sufficient financial, technical and other resources to meet the costs to effectively implement and manage national and regional systems of protected areas are secured, including both from national and international sources, particularly to support the needs of developing countries and countries with economies in transition and small island developing States.	For the Natura 2000 Network this is expected to be realized in 2013.
3.5. To strengthen communication, education and public awareness.	By 2008 public awareness, understanding and appreciation of the importance and benefits of protected areas is significantly increased	

Goals	Target	Progress
4.1. To develop and adopt minimum standards and best practices for national and regional protected area systems.	By 2008, standards, criteria, and best practices for planning, selecting, establishing, managing and governance of national and regional systems of protected areas are developed and adopted.	Standards and criteria are developed and adopted.
4.2. To evaluate and improve the effectiveness of protected areas management.	By 2010, frameworks for monitoring, evaluating and reporting protected areas management effectiveness at sites, national and regional systems, and transboundary protected area levels adopted and implemented by Parties	Monitoring systems, as basis for evaluation and reporting, on national level are realized. Monitoring of the effectiveness of site management is in development and expected to be operational in 2013.
4.3. To assess and monitor protected area status and trends.	By 2010, national and regional systems are established to enable effective monitoring of protected-area coverage, status and trends at national, regional and global scales, and to assist in evaluating progress in meeting global biodiversity targets	Monitoring systems on national level are realized. Monitoring of the effectiveness of site management is in development and expected to be operational in 2013.
4.4 To ensure that scientific knowledge contributes to the establishment and effectiveness of protected areas and protected area systems.	Scientific knowledge relevant to protected areas is further developed as a contribution to their establishment, effectiveness, and management	Realized.