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NATIONAL BIODIVERSITY STRATEGY AND
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BIODIVERSITY

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ANALYSIS OF NBSAPS SUBMITTED BY ASEAN COUNTRIES

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Table 1 – NBSAPs and National Reports submitted to SCBD

An overview of NBSAPs and national reports submitted to the Secretariat to date is presented below. All ASEAN countries, with the exception of Brunei Darussalam (non-Party) and Myanmar, have prepared a NBSAP, although the Secretariat is aware that Myanmar is in the process of preparing its first NBSAP. Moreover, Indonesia, Philippines, Singapore and Thailand have completed NBSAP revisions and Vietnam has completed a draft NBSAP revision. Eight of nine Parties have submitted a third national report to date, representing a noteworthy increase in comparison with the number of first and second national reports received. Submission of third national reports is particularly relevant in terms of the information they provide to measure achievement of the 2010 biodiversity target goals.

Country	NBSAP (year of adoption)	First national report	Second national report	Third national report
Brunei Darussalam * not a CBD Party	N/A	N/A	N/A	N/A
Cambodia	Yes (2002)	No	No	Yes
Indonesia	Yes (1 st NBSAP adopted in 1993); Yes (revised NBSAP for period 2003-2020 adopted in 2003)	Yes	Yes	Yes
Lao PDR	Yes (Strategy to 2020 & Action Plan to 2010 adopted in 2004)	No	No	No
Malaysia	Yes (1998)	Yes	No	Yes
Myanmar	No (3 rd NR received in Sept 05 says NBSAP is under way)	No	No	Yes (but incorrect format used)
Philippines	Yes (1 st NBSAP adopted in 1997) Yes (Second NBSAP Iteration completed in 2002)	Yes	Yes	Yes
Singapore	No (Green Plan 2012 - 2002 Edition adopted in 2002) Yes (Green Plan 2012 - 2006 Edition adopted in 2006)	Yes	Yes	Yes
Thailand	Yes (1 st NBSAP adopted in 1997) Yes (revised NBSAP for period 2003-2007 adopted in 2002)	Yes	Yes	Yes
Vietnam	Yes (1995) * 3 rd NR received March 2006 states that draft of Biodiversity Action Plan to 2010 and vision toward 2015 has been completed	Yes	Yes	Yes

Table 2 - CBD Thematic Areas and Cross-cutting Issues in the NBSAPs

The information presented below indicates that, with the exception of dry and sub-humid lands biodiversity, all thematic areas are substantially covered in the NBSAPs of the ASEAN countries. The same can be said about cross-cutting areas, with the exception of the following five areas, that are not included in the large majority of NBSAPs:

- Climate change and biological diversity (63%)
- Global Strategy for Plant Conservation (50%)
- Global Taxonomy Initiative (38%)
- Ecosystem Approach (25%)
- Liability and Redress – Article 14(2) (0%)

Thematic Areas	Cambodia	Indonesia	Lao PDR	Malaysia	Philippines	Singapore	Thailand	Vietnam	Total 'Y'	% for all countries reviewed
Agricultural biodiversity	Yes	Yes	Yes	Yes	Yes	No	Yes	Yes	7	88%
Dry and sub-humid lands biodiversity	N/A	Yes	No	N/A	Yes	N/A	No	Yes	3	38%
Forest biodiversity	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	8	100%
Inland waters biodiversity	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	8	100%
Island biodiversity	Yes	Yes	N/A	Yes	Yes	Yes	Yes	Yes	7	88%
Marine and coastal biodiversity	Yes	Yes	N/A	Yes	Yes	Yes	Yes	Yes	7	88%
Mountain biodiversity	Yes	Yes	Yes	Yes	Yes	N/A	No	Yes	6	75%
Cross-cutting Areas										
Access to genetic resources and benefit-sharing	Yes	Yes	Yes	Yes	Yes	No	Yes	Yes	7	88%
Invasive alien species	Yes	Yes	Yes	Yes	Yes	No	Yes	Yes	7	88%
Biological diversity and tourism	Yes	Yes	Yes	Yes	No	No	Yes	Yes	6	75%
Climate change and biological diversity	Yes	Yes	Yes	No	No	Yes	No	Yes	5	63%
Economics, trade and incentive measures	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	8	100%
Ecosystem Approach	No	Yes	No	No	Yes	No	No	No	2	25%
Global Strategy for Plant Conservation	No	Yes	No	No	Yes	Yes	No	Yes	4	50%
Global Taxonomy Initiative	No	Yes	No	No	Yes	No	Yes	No	3	38%
Impact assessments	No	No	Yes	Yes	Yes	Yes	Yes	Yes	6	75%

Indicators	Yes	Yes	Yes	No	Yes	Yes	No	Yes	6	75%
Liability and redress – Article 14(2)	No	No	No	No	No	No	No	No	0	0%
Protected areas	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	8	100%
Public education and awareness	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	8	100%
Sustainable use of biodiversity	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	8	100%
Technology Transfer and cooperation	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	8	100%
Traditional knowledge, innovations and practices	Yes	Yes	Yes	Yes	Yes	N/A	Yes	Yes	7	88%

Table 3 - Referencing the CBD 2010 Target in the NBSAPs

The information below confirms non-reference to the CBD Strategic Goal and 2010 Biodiversity Target in all ASEAN NBSAPs. However, it should be noted that, with the exception of Singapore's Green Plan 2012 - 2006 Edition, adopted in 2006, all NBSAPs and NBSAP revisions were completed prior to the promotion of the incorporation of the 2010 targets in these documents.

Country	Does the NBSAP make any reference / linkage to the CBD strategic goal and 2010 target?
Cambodia	No
Indonesia	No
Lao PDR	No
Malaysia	No
Philippines	No
Singapore	No
Thailand	No
Vietnam	No

Table 4 - Coverage of the Six Key Elements in Strategy Development

The information presented below indicates that overall coverage of the six key elements in strategy development is fragmented and particularly weak in some areas. Indonesia comes closest to covering all six elements in its NBSAP. While all countries have identified objectives and actions in their NBSAPs, Vietnam only has included locale-specific work to be undertaken. Fifty per cent of countries (Indonesia, Lao PDR, Singapore, Thailand) have assigned an overall timeframe for NBSAP implementation however only 25% (Indonesia, Vietnam) have set implementation timeframes against each objective/action. Also, only 25% (Cambodia, Indonesia) have assigned priority levels to objectives/actions in the NBSAP document itself. All countries have identified the lead agency responsible for overall NBSAP implementation however only 38% (Cambodia, Indonesia, Vietnam) have identified the lead agency, key players, partners and agencies against each activity. A small majority of countries provide general descriptions of the non-marketable and marketable values of biodiversity. The Secretariat is not aware of a separate implementation plan that has been prepared by a country.

	Cambodia	Indonesia	Lao PDR	Malaysia	Philippines	Singapore	Thailand	Vietnam
WHAT – Have objectives and actions been identified?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
WHERE – Do actions identify locale-specific work to be undertaken?	No	No	No	No	No	No	No	Yes
WHEN – Does the NBSAP have an overall timeframe? (i.e. the strategy is from year X to year Y)	No	Yes (2003-2020)	Yes (Strategy to 2020; Action Plan to 2010)	No	No	Yes (2006 - 2012)	Yes (2003-2007)	No
• Has a timeframe for implementation been set against each obj/action?	No	Yes	No	No	No	No	No	Yes
• Has distinction been made between the varying 'priority levels' of any one objective/action within the NBSAP document itself?	Yes	Yes, priorities distinguished according to specific timeframe assigned	No	No	No	No	No	No
WHO – Has the Lead Agency responsible for overall NBSAP implementation been identified?	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
• Has the lead agency been identified against each activity?	Yes	Yes	No	No	No	No	No	Yes
• Have the key players/partners/agencies associated with implementing each obj/action been identified against each activity?	Yes	Yes	No	No	No	No	No	Yes

WHY – (A) Does the NBSAP outline the 'Non-marketable' values of biodiversity?	Yes (minimally)	Yes	No	Yes (minimally)	Yes (minimally)	No	? (main body of NBSAP is not available to SCBD)	Yes
(B) Does the NBSAP outline the marketable/economic values of biodiversity – with monetary figures provided?	Yes (minimally)	Yes	Yes (minimally)	Yes (minimally)	No	No	? (main body of NBSAP is not available to SCBD)	Yes
HOW – Have separate implementation plan(s) been developed since the NBSAP production?	Not that SCBD is aware of	Not that SCBD is aware of	Not that SCBD is aware of	Not that SCBD is aware of	Not that SCBD is aware of	Not that SCBD is aware of	Not that SCBD is aware of	Not that SCBD is aware of

Table 5 - Targets and Indicators

The information below indicates that the use of both targets and indicators, as tools for monitoring and evaluating implementation, is included in the NBSAP of Thailand only. However, the targets and indicators developed by Thailand are overarching ones (separate targets and indicators for actions have not been developed).

Country	Does the NBSAP have integral measurable TARGETS?	Does the NBSAP have integral INDICATORS?
Cambodia	No	Yes
Indonesia	No	Yes
Lao PDR	No	No
Malaysia	No	No
Philippines	No	No
Singapore	No	No
Thailand	Some	Some
Vietnam	No	No

Table 6 – Policies, Plans and other Strategies

Examples of national policies, plans and other strategies produced that reflect biodiversity conservation concerns are reflected in the table below.

Cambodia	<ul style="list-style-type: none"> • National Environmental Action Plan (1998) • Participatory Land Use Planning • National Strategic Development Plan (2006-2010) • National Strategy for Poverty Reduction (2003-2005) • National Forest Policy • Sustainable Forest Management Policy • Rectangular Strategy (2004) • Forestry and Fishery Reform Policy • National Action Plan for Land Degradation
Indonesia	<ul style="list-style-type: none"> • National Development Program 2000-2004 (relevant biodiversity sections) • Strategic Plan (Ministry of Forestry) • ASEAN Action Plan developed by Ministry of Forestry to curb illegal wildlife trade in ASEAN countries • Action Plan for the Indonesian Summit for Sustainable Development
Lao PDR	<ul style="list-style-type: none"> • NBCA Management Plan • National 5th Socio-economic Five Year Plan • National Environmental Action Plan (NEAP)
Malaysia	<ul style="list-style-type: none"> • Five Year Development Plans • Outline Perspective Plans • National Development Plan • National Physical Plan for Mountain and Land Use • Crocker Range Park Management Master Plan (2004) • Sabah Conservation Strategy (1992) • Sabah Structure Plan (2020) • Sarawak Forest Policy (1954)
Philippines	<ul style="list-style-type: none"> • Philippine Development Plan • National Action Plan (NAP) to combat desertification, land degradation, drought, and poverty (2004-2010) • National Wetlands Action Plan • National Physical Framework Plan

	<ul style="list-style-type: none"> • Sustainable Agriculture and Marginal Uplands Development Program • DENR General Plan of Action • Revised Master Plan for Forestry Development • Policy on transfer of genetic resources • Philippine Biodiversity Conservation Priority (PBCP) Program
Singapore	<ul style="list-style-type: none"> • Urban Redevelopment Authority (URA) Master Plan (2003) • Plant Conservation Strategy • Bird Conservation Strategy
Thailand	<ul style="list-style-type: none"> • 9th National Economic and Social Development Plan • Environmental Quality Management Plan • ASEAN Strategic Plan of Action on the Environment (1994 – 1998) • ASEAN Environmental Education Action Plan (2000 – 2005) • ASEAN Regional Haze Action Plan
Vietnam	<ul style="list-style-type: none"> • National Strategy for Environmental Protection to 2010 • Comprehensive Strategy for Growth and Poverty Reduction • Orientations for Sustainable Development in Vietnam (known as Vietnam's Agenda 21) • National Strategy for Environmental Protection to 2010 and its Orientations towards 2020 • Aquatic Resources Protection and Development Programme • Management Strategy for a Protected Areas System in Vietnam to 2010 • Five Million Hectares Forestation Programme • Plan for Conservation and Sustainable Development of Wetlands (2004-2010) • National Conservation Strategy (1985) * one of the first of its kind developed in a developing country • National Plan on Environment and Sustainable Development for 1991-2000 (1991) • Tropical Forestry Action Plan (1991) • Ministry of Forestry Decision 276 banning the hunting of 38 wildlife species (1989) • Regulations on the hunting of forest wildlife (1963) • Marine turtle conservation action plan to 2010

Table 7 – Legislation

Examples of domestic legislation produced as a result of/associated with the NBSAP are reflected in the table below.

Cambodia	<ul style="list-style-type: none"> • Environmental Law (1996) • Law on Environmental Protection and Natural Resource • Management Law on Wildlife Hunting and Trade • Forestry Law (2002) • Land Law • Forestry and Environmental Law of the rights of indigenous and local community • Sub-decree on Community Forestry • Sub-decree on Community Fisheries
Indonesia	<ul style="list-style-type: none"> • Act No.5/1990 on Conservation of natural resources and ecosystem • Government Regulation No.7/1999 on Preservation of Plant and Animal Species • Act No.24/1992 on Spatial Planning • Presidential Decree No.32/1990 on Protected Areas • Act No.5/1994 on the Ratification of United Nations Convention on Biological Diversity • Act No.23/1997 on Environmental Management • Act No. 25/2000 on National Development Program (PROPENAS 2000-2004) • MPR Decree No. IX/MPR/2001 on Agrarian Reform and Natural Resource Management • Act No. 22/1999 on Regional Government • Government Regulation No 27/1999 on Environmental Impact Assessment • Act No. 25/1999 on Fiscal Balance between the Central Government and the Regions • Act No. 14/2000 on Patents • National Agenda 21 (1997) • Act No. 41/1999 on Forestry • Government Regulation No. 8/1999 on the Utilization of Wild Species of Flora and Fauna • Presidential Decree No. 43/1978 on Ratification of CITES • Presidential Decree No. 48/1991 on Ratification of the Ramsar Convention on Wetlands • Act No. 12/1992 on Plant Cultivation System • Act No. 29/2000 on Plant Variety Protection • Law No. 8/2001 regarding fertilizer for agricultural purposes • Ministerial Decree No. 10/2002 on Integrated Coastal Zone Management and draft law on Coastal Zone Management • Government Regulation No 34/2002 regarding Forest Planning, Management, Utilization and Land Use • Forestry Decree No. 456/2004
Lao PDR	<ul style="list-style-type: none"> • The Forestry Law (1996) • The Water and Water Resources Law (1996) • The Electricity Law (1997) • The Mining Law (1997) • The Agriculture law (1998) • The Environmental Protection law (1999) • Decree On agreement and Endorsement of the National Biodiversity Strategy to 2020 and Action Plan to 2010 • The Decree on the implementation of Environmental Protection Law (2001)
Malaysia	<p><i>Federal</i></p> <ul style="list-style-type: none"> • Environmental Quality Act (1974) • Fisheries Act (1985) • Pesticides Act (1974) • Plant Quarantine Act (1976)

	<ul style="list-style-type: none"> • Customs (Prohibition of Exports) (Amendment) (No.4) 1993 <p><i>Peninsular Malaysia</i></p> <ul style="list-style-type: none"> • Waters Act (1920) • Protection of Wildlife Act (1972) • Aboriginal Peoples Act (1954) • Land Conservation Act (1960) • National Land Code (1965) • National Parks Act (1980) • National Forestry Act (1984)
Philippines	<ul style="list-style-type: none"> • Republic Act 9147 on the Wildlife Resources and Conservation and Protection Act • Clean Air Act 1999 (RA 8749) • Ecological Solid Waste Management Act of 2002 (RA 9003). • Republic Act 7586, otherwise known as the National Integrated Protected Areas System (NIPAS) Law • Environmental Impact Assessment Law – The Philippine EIA System had been in place since 1978 with the issuance of Presidential Decree 1586 • Indigenous People's (IPs) Rights Act (IPRA or RA 8371) • Republic Act 9072, the National Caves and Cave Resources Management and Protection Act
Singapore	<ul style="list-style-type: none"> • Wild Animals and Birds Act • National Parks Board Act • Parks and Trees Act • Fisheries Act
Thailand	<ul style="list-style-type: none"> • Forestry Act B.E. 2484 (1941) • Environmental Quality Promotion Act B.E. 2535 (1992) • Plant Varieties Act B.E. 2518 revised 2535 (1975 revised 1992) • Plant Varieties Protection Act B.E. 2542 (1999) • Protection and Promotion of Traditional Thai Medical Intelligence Act B.E. 2542 (1999) <p>* The last two acts promote and support indigenous and local knowledge on plant utilizations.</p>
Vietnam	<ul style="list-style-type: none"> • Forest Protection and Development Law (amendment) • Decree No.11/2002/ND-CP on management of import, export and transit of wild animals and plants • Decree No.48/2002/ND-CP on amendment and supplement for the directory of rare and precious wild animals and plants • Ordinance on plant varieties (2004) • Ordinance on domestic animal varieties (2004) • Ordinance on plant protection and quarantine • Law on Environmental Protection (1994) • Ordinance on Forest Protection (1972) • 1988 Land Law (revised 1993) • Decree on Mineral Resources (1989) • Health Protection Law (1989) • Decree on Protection of Water Resources (1989) • Legislation on protection of dams and dykes (1989) • Law on Ocean Shipping (1990) • Law on Environmental Protection (1994) • Decree on Forest Protection (including protection for wildlife) (1973) • Law on Forest Protection and Development (1991) • Ordinance on Fisheries Resources Protection (1989) • Government Decree No.12-CP (1997) provides detailed guidelines on implementation of Vietnam's Foreign Investment Law • Government issued Decree No.121/2004/ND-CP regarding to regulations on administrative fines in the field of environmental protection • Law on Forest Protection and Development (amended) • Decree No. 13/2001/ND-CP on Protection of new plant varieties

	<ul style="list-style-type: none"> • Ordinance on Plant Protection and Quarantine • Decree No. 11/2002/ND-CP on Management Export, Import and Transit of Wild Animals and Plants • Decree No. 48/2002/ND-CP issued by Government on amending and supplementing the list of precious and rare wild plants and animals, issued together with Decree No, 18/HDBT of January 17, 1992 of the Council of Ministers prescribing the list of precious and rare forest plants and animals and the regime of management and protection thereof
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Table 8 - Party Membership of MEAs and Associated Agreements

The table below provides an overview of countries' ratification of the other Rio Conventions, five biodiversity-related conventions and the Cartagena Protocol on Biosafety.

	UNFCCC	UNCCD	Ramsar	CITES	CMS	WHC	ITPGR	Biosafety Protocol
Brunei Darussalam * not a CBD Party	Yes	Yes	No	Yes	No	No	No	No
Cambodia	Yes	Yes	Yes	Yes	No	Yes	Yes	Yes
Indonesia	Yes	Yes	Yes	Yes	No	Yes	Yes	Yes
Lao PDR	Yes	Yes	No	Yes	No	Yes	Yes	Yes
Malaysia	Yes	Yes	Yes	Yes	No	Yes	Yes	Yes
Myanmar (NBSAP not submitted)	Yes	Yes	Yes	Yes	No	Yes	Yes	Yes
Philippines	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Singapore	Yes	Yes	No	Yes	No	No	No	No
Thailand	Yes	Yes	Yes	Yes	No	Yes	No	Yes
Vietnam	Yes	Yes	Yes	Yes	No	Yes	No	Yes

Table 9 – NBSAP linkage with particular strategies

This information indicates that overall mainstreaming of NBSAPs with the particular strategies highlighted below has been moderately successful. Fifty per cent of countries (Indonesia, Lao PDR, Malaysia, Philippines) have linked their NBSAPs with National Sustainable Development Strategies, and 50% (Cambodia, Lao PDR, Malaysia, Thailand) with National CBD Biosafety Frameworks. However, only 25% (Cambodia, Lao PDR) have created linkages with Poverty Reduction Strategy Papers (PRSPs), and 25% (Cambodia, Singapore) with Climate Change Adaptation Strategies. Notably, no country has mainstreamed their NBSAP with action plans for achieving the Millennium Development Goals.

	Millennium Development Goals (MDGs)	Poverty Reduction Strategy Papers (PRSPs)	National Sustainable Development Strategy – Agenda 21	Climate Change Adaptation Strategy	National Action Plan – UNCCD	National Biosafety Frameworks – CBD
Cambodia	No	Yes	No	Yes	No	Yes
Indonesia	No	No	Yes	No	No	No
Lao PDR	No	Yes	Yes	No	No	Yes
Malaysia	No	No	Yes	No	No	Yes
Philippines	No	No	Yes	No	No	No
Singapore	No	No	No	Yes	No	No
Thailand	No	No	No	No	No	Yes
Vietnam	No	No	No	No	No	No

Table 10 - Key Challenges and Obstacles to Implementing NBSAPs

The following provides the list of challenges and obstacles to implementation of the Convention identified by the sixth meeting of the Conference of the Parties (Decision VI/26). With the exception of Singapore, all countries indicated, either directly or indirectly, that all eight categories related to their national situation.

1. Political/societal obstacles
 - a. Lack of political will and support to implement the Convention on Biological Diversity
 - b. Limited public participation and stakeholder involvement
 - c. Lack of mainstreaming and integration of biodiversity issues into other sectors, including use of tools such as environmental impact assessments
 - d. Political instability
 - e. Lack of precautionary and proactive measures, causing reactive policies.
2. Institutional, technical and capacity-related obstacles
 - a. Inadequate capacity to act, caused by institutional weaknesses
 - b. Lack of human resources
 - c. Lack of transfer of technology and expertise
 - d. Loss of traditional knowledge
 - e. Lack of adequate scientific research capacities to support all the objectives.
3. Lack of accessible knowledge/information
 - a. Loss of biodiversity and the corresponding goods and services it provides not properly understood and documented
 - b. Existing scientific and traditional knowledge not fully utilized.
 - c. Dissemination of information on international and national level not efficient
 - d. Lack of public education and awareness at all levels.
4. Economic policy and financial resources
 - a. Lack of financial and human resources
 - b. Fragmentation of GEF financing
 - c. Lack of economic incentive measures
 - d. Lack of benefit-sharing.
5. Collaboration/cooperation
 - a. Lack of synergies at the national and international levels
 - b. Lack of horizontal cooperation among stakeholders
 - c. Lack of effective partnerships
 - d. Lack of engagement of scientific community.
6. Legal/juridical impediments
 - a. Lack of appropriate policies and laws
7. Socio-economic factors
 - a. Poverty
 - b. Population pressure
 - c. Unsustainable consumption and production patterns
 - d. Lack of capacities for local communities.
8. Natural phenomena and environmental change
 - a. Climate change
 - b. Natural disasters.

Country Overviews

Cambodia

Priorities

The Cambodian NBSAP, adopted in 2002, recommends a sectoral approach to managing biodiversity. The document comprises 17 thematic areas and 98 priority actions and provides a framework for mainstreaming biodiversity at various levels to ensure the health of natural systems through which poverty reduction and improved quality of life for Cambodians can be achieved. An inter-ministerial National Biodiversity Steering Committee, composed of representatives of federal ministries, was established in 2001 to develop the NBSAP. Thematic experts, NGOs and universities participated in preparatory workshops and other stakeholders (provincial and urban governments, private property owners, businesses, indigenous and local communities, international conservation organizations) were consulted during the course of the development of the NBSAP.

The main strategic goals of the NBSAP include:

1. Maintaining biological diversity and productivity of ecological systems by protecting the various species of living organisms in their natural and manmade environments.
2. Managing human activities and utilizing biological resources in a way that preserves for the long term the basic natural resources, which are necessary for human livelihood and development.
3. Ensuring that the benefits coming from the sustainable use of biological resources contribute to poverty reduction and improve quality of life for all Cambodians.

Prioritized actions include:

1. Actions promoting awareness and capacity building for conservation and sustainable use of biological resources.
2. Actions promoting the implementation of community-based natural resource management.
3. Actions clarifying ministerial jurisdictions, reducing responsibility overlap and promoting interministerial coordination.

Strategic objectives include indicators to guide the primary actors (relevant ministries and some NGOs) during the course of implementation. Actions are presented for 17 themes which involve most sectors of society. A guiding principle of the NBSAP is that local communities be considered in biodiversity management. Theme 17 on “Quality of Life and Poverty Reduction” prioritizes actions related to capacity-building for women’s groups.

Communication

To date, environmental education has been limited and heavily dependent on NGO activities. Although some activities have been undertaken through support received from international organizations, the Inter-ministerial Steering Committee for Environmental Education, responsible for environmental education at all levels, was not operational at the time of the writing of the NBSAP due to lack of funding. Prioritized actions include the development of biodiversity awareness programs, in collaboration with ministries, NGOs and the university; a national biodiversity research, training and information facility; environmental and biodiversity integration in school curriculum; capacity-building for government staff and relevant agencies; a biodiversity research program at the Royal University of Phnom Penh; training program on the management of natural resources for communities.

Monitoring and reporting

The NBSAP is viewed to be an ongoing process which will require periodic adjustments due to new national, regional and international contexts. Implementation of the Action Plan will be decentralized in approach with each participating ministry, agency or NGO being accountable for actions listed under their responsibility. Mechanisms proposed for implementing the NBSAP include the establishment of a permanent Inter-ministerial Biodiversity Steering Committee and National Secretariat for Biodiversity; preparation of an annual national report on policies, activities and plans aimed at implementing the Strategy; measures to allow and encourage non-government participation in the implementation of the Strategy; regular reporting on the indicators identified for each strategic objective; reporting on the status of biodiversity at the country level; and revision of the strategy after an initial implementation phase of two years.

Biodiversity and socio-economic development

Sustainable development in tourism represents one of the main opportunities provided to Cambodia for rebuilding its economy. This sector is rapidly expanding and dependent on the protection and preservation of the natural and socio-cultural environments. The establishment of a well-managed network of protected areas and cultural sites, involving local communities, can contribute significantly to tourism development. Priority actions include integrating biodiversity conservation and environmental management in policies, plans and guidelines related to tourism, including EIA for tourism development projects; carrying out village-based tourism programs; integrating the conservation of cultural heritage and nature in the tourism development program.

Indonesia*Priorities*

Indonesia's first Biodiversity Action Plan (BAP) was published in 1993 prior to the ratification of the Convention on Biological Diversity. Although some NGOs were involved in the implementation of this document, its formulation was viewed as highly exclusive in nature, with a "top down" approach that limited public participation. Commitment was lacking among stakeholders, as was an effective communication strategy. In short, this action plan was considered ineffective.

The second edition, published in 2003, covers the period 2003-2020. In line with Indonesia's new era of decentralization, it emphasizes an approach for biodiversity management that is decentralized, participatory, and transparent, focussing on a "shift in the development paradigm, a new social contract between government, private sector, NGOs, communities and national, regional and local levels, and the strengthening of the preconditions for sustainable and equitable biodiversity management." The output of this process comprises 3 documents: IBSAP National Document, IBSAP Regional Document and the Directory of Indonesian Stakeholders of Biodiversity, however only the first is available in English. The formulation of the National Document was coordinated by the National Development Planning Agency (BAPPENAS) and involved consultation with civil society, academia, private sector and governments at national, provincial and kabupaten levels. It is hoped that the document will become a point of reference for all institutions involved with biodiversity management in Indonesia, including the private sector.

The current document is divided into time period and operational strategies. The first phase termed the "initial and dissemination phase" was scheduled to begin in 2003 with priority given to the dissemination of the IBSAP documents as well as to preparations for an institutional infrastructure and national policies related to the long-term management of biodiversity. The "transitional phase (2004-2008)" was to emphasize the creation and communication of national programs and policies, paradigms and actions supporting sustainable biodiversity management as well as the strengthening of efforts to reduce the rate of biodiversity degradation. The "consolidation phase (2009-2020)" will accelerate implementation of

the entire action plan with importance being attached to measurable rehabilitation, conservation and balanced biodiversity utilization. It is hoped that sustainable biodiversity management will have been developed at this point through good governance, effective law enforcement and management practices based on traditional wisdom, local knowledge and equitable benefit-sharing.

Four operational strategies have been developed with which to implement the IBSAP: mainstreaming strategy, capacity-building strategy, decentralization strategy and a participation and movement strategy. The mainstreaming strategy aims to develop national policy and a legal framework, incorporating the provisions of relevant international conventions, that can also be operationalized at the regional level, in conformity with local conditions. National-level mainstreaming of biodiversity management should place importance on implementation of the concept of community behaviour and actions at local, regional and national levels. The decentralization strategy, based on local biodiversity management situations, recommends that the national-level policy and legal framework contain wide provisions for regions to formulate and implement local biodiversity action plans.

The national action plan is based on 5 objectives:

1. To develop the quality of life of Indonesian individuals and society who are concerned with the conservation and sustainable use of biodiversity.
2. To strengthen resources for supporting the development of science, technology and the application of local wisdom for the conservation and sustainable use of biodiversity.
3. To reduce and stop the rate of biodiversity degradation and extinction at the national, regional and local levels within the 2003-2020 period, along with rehabilitation and sustainable use efforts.
4. To empower institutional, policy and law enforcement arrangements at the national, regional, local, as well as customary level so as to be effective and conducive for the management of biodiversity in a synergic, responsible, accountable, fair, balanced and sustainable manner.
5. To achieve fair and balance of roles and interests of Indonesian society, as well as to reduce conflict potentials among all relevant sectors in a conducive, synergic, responsible, accountable manner in the sustainable use and conservation of biodiversity.

Implementation of biodiversity management is currently undertaken by many sectoral agencies, however co-ordination among them is poor. An independent and multistakeholder team was to convene in 2003 to address institutional arrangements and capacity-building for implementation at all levels of government. Some stakeholders were of the opinion that the introduction of new institutions was unnecessary and that focus should rather be put on strengthening the functions, tasks and authorities of existing institutions, particularly within the Ministry of Environment.

Although most programs are implemented at the national level, regions are also assigned responsibilities for implementation. Activities included in the action plan also call for collaboration with the business sector, mining companies, NGOs, media, local communities, universities, police and customs officers, farmers' organizations and lawyers' associations.

Communication

A large segment of Indonesian society still has a low level of awareness and understanding of the value of biodiversity in their daily lives and for national development. Most stakeholders are aware of the short-term productive value of certain resources only. Awareness-raising activities, including introduction to the IBSAP documents, were to begin at the outset of IBSAP implementation in 2003. Training for the Bupatis and members of the regional House of Representative was prioritized.

Biodiversity information systems in existence include the Indonesian Biodiversity Information System (IBIS); Biodiversity Information Center and Nature Conservation Information Center; National Biodiversity Information Network (NBIN); and the CBD Clearing-House Mechanism.

Monitoring and reporting

It is recommended that monitoring of the IBSAP be conducted annually, and evaluation conducted prior to each national development period in order to incorporate results into national and regional development plans. It was hoped that a mechanism and framework for conducting these activities would be developed by the end of 2003, an important feature of which would be the establishment of performance indicators to measure the success of actors involved in biodiversity management, particularly relevant ministries and local governments. These indicators would be formulated through public consultation, as a part of the IBSAP dissemination and communication program, and subsequently adopted by national and regional governments. Communities and the private sector are also encouraged to conduct independent monitoring and evaluation of IBSAP implementation.

Biodiversity and socio-economic development

Despite pressure placed on businesses to implement good biodiversity management practices, progress in this area is still very weak. However, an Indonesian traditional medicine company is attempting to alter this trend by working with community groups, farmers' groups, universities and research institutions to conserve medicinal plants through the preservation of tradition on the use of local medicinal plants. A nursery has been created for these plants and waste from production is being recycled for use as fodder and organic fertilizer.

Lao PDR

Priorities

The NBSAP of the Lao PDR, completed in 2004, comprises a strategy to 2020 and an action plan to 2010. With poverty being the single most important problem facing the country today, the NBSAP is viewed as an important tool for biodiversity conservation and sustainable development, poverty alleviation and improved quality of life for the people of Lao PDR. In view of this, the NBSAP also supports the long-term objectives set by the Socio-economic Development Vision and especially those of the National Environment Strategy and National Poverty Eradication Programme. However, it should be noted that the concept of the role that biodiversity can play in socio-economic development is still very much in its infancy.

The NBSAP's 7 main objectives are to:

1. Identify important biological diversity components and improve the knowledge base.
2. Manage biodiversity on regional basis, using natural boundaries to facilitate the integration of conservation and utilization oriented management.
3. Plan and implement a biodiversity specific human resource management program.
4. Increase public awareness of and encourage participation in sustainable management of biodiversity.
5. Adjust national legislation and regulations and harmonise them MEAs.
6. Secure the NBSAP implementation.
7. Promote country needs driven international cooperation.

The action plan lists activities to be implemented by 2010 for the above 7 areas however does not assign accompanying implementation responsibilities to stakeholders. Rather, the report states, in general, that the Science, Technology and Environment Agency (STEA), the Ministry of Agriculture and Forestry

(MAF) and other relevant ministries, relevant local government sectors, mass organizations, internal and external private sector organizations running businesses in Lao PDR, international organizations (regional and subregional), and NGOs, are the main target groups for implementation of activities. All sectors, both at central and local levels, are responsible for translating the requirements of the NBSAP into their respective action plans.

The contribution of the ethnobiological knowledge of Lao PDR's local and indigenous people is stressed in the NBSAP. Actions are highlighted to promote the participation of these groups in biodiversity research and management, and to ensure equitable benefit-sharing which may arise from the use of traditional knowledge and practice. Actions to legally safeguard the social and economic benefits resulting from the use of genetic material and products originating in the Lao PDR are also covered in the plan, as is capacity-building in the field of modern biotechnology. The country's industrial sector, primarily composed of cement factories, wood processing plants, garment industries and hydroelectric power stations, has changed significantly over the last decade from being state-owned enterprises to several small- and medium-scale private sector enterprises. Ecotourism is also being developed in the country. The role this sector can play in biodiversity conservation and socio-economic development is being given much attention.

Communication

The need to raise awareness among government leaders, as well as in the private and public sectors, youth groups and women's groups is recognized. The Ministry of Education is currently developing a biodiversity curriculum for integration into various levels of the educational system. Environmental education, including biodiversity conservation issues, have been incorporated into the curricula of common schools and vocational colleges. The Faculty of Natural Science of the National University of Laos has improved their curriculum with biodiversity-related topics in order to meet the growing demand for this type of information.

Monitoring and reporting

Clear mechanisms for ensuring implementation of the NBSAP at national, regional and international levels, producing annual reports and NBSAP revisions, increasing the participation of local and private sector groups in implementation, had still not been developed at the time of the writing of the NBSAP.

Biodiversity and socio-economic development

Nine of the country's seventeen rural provinces are engaged in activities to develop and promote ecotourism. The rapid growth of this sector has an immense potential to alleviate poverty while conserving Lao PDR's natural and cultural heritage. An award was presented to the Lao PDR by the United Nations Development Programme in recognition of its first ecotourism project and contribution towards poverty alleviation. Pragmatic management is planned for this sector with carefully targeted support for enterprises that are sensitive to environmental and cultural needs.

Malaysia

Priorities

Malaysia adopted its "National Policy on Biological Diversity" in 1998. The fifteen strategic themes listed below are contained in the document with accompanying actions.

1. Improve the Scientific Knowledge Base
2. Enhance Sustainable Utilisation of the Components of Biological Diversity

3. Develop a Centre of Excellence in Industrial Research in Tropical Biological Diversity
4. Strengthen the Institutional Framework for Biological Diversity Management
5. Strengthen and Integrate Conservation Programmes
6. Integrate Biological Diversity Considerations into Sectoral Planning Strategies
7. Enhance Skill, Capabilities and Competence
8. Encourage Private Sector Participation
9. Review Legislation to Reflect Biological Diversity Needs
10. Minimize Impacts of Human Activities on Biological Diversity
11. Develop Policies, Regulations, Laws and Capacity Building on Biosafety
12. Enhance Institutional and Public Awareness
13. Promote International Cooperation and Collaboration
14. Exchange of Information
15. Establish Funding Mechanisms

It is Malaysia's hope that the country will have been transformed into a world centre of excellence in conservation, research and utilization of tropical biological diversity by 2020. Biotechnology is a very lucrative sector for Malaysia and as such its development is accorded high priority. Floriculture is another sector with great economic potential. Activities included in the action plan relate to the establishment of an inventory of traditional knowledge on the use of species and genetic diversity, economic valuation of the goods and services of biological diversity and bioprospecting. Consequently, Malaysia has given priority to the formulation of a regulatory biosafety framework in the short term.

A guiding principle of the National Policy is that the "role of local communities in the conservation, management and utilisation of biological diversity must be recognized and their rightful share of benefits should be ensured." The development of sectoral and cross-sectoral policies and plans, incentives, the conduct of environmental impact assessments by sectors and the establishment of a national biodiversity centre to coordinate programmes related to implementation, set priorities, monitor and manage information are also planned. Participation of NGOs and the private sector, particularly as relates to information it can provide on appropriate technologies, including biotechnology, is stressed. International cooperation on matters dealing with, for example, germplasm exchange, technology transfer and information exchange is also promoted, as well as regional collaboration to deal with transboundary issues. The government has also planned to seek cooperation in regard to the repatriation of information, particularly that which is not in the public domain.

The Malaysian government stresses the inclusion of biological diversity issues in long- and medium-term development plans, such as Five Year Development Plans, Outline Perspective Plans and National Development Plans. No legislation exists in Malaysia that deals with biodiversity conservation and management comprehensively. Rather, existing legislation is sector-based. The action plan calls for a review of the adequacy of current legislation and identification of areas, such as practice codes for collectors, intellectual property, ownership rights, biosafety, alien species, where new legislation may be required.

Communication

Malaysia believes that reward mechanisms should be put in place to strengthen biodiversity education. Moreover, educational curricula and training programmes should be reoriented and include specific references to the conservation and sustainable use of biological diversity. The role that NGOs have in promoting awareness should also be taken into consideration. Mechanisms for information exchange at national and international levels should be develop or strengthened, as should information centres and networks to disseminate information available at government, academic, industry, NGO and individual levels.

Monitoring and reporting

The institutional framework for NBSAP implementation requires strengthening. The action plan suggests that a committee, composed of representatives of federal ministries, agencies and state governments, be established to deal with matters related to implementation at federal, state and local levels. This committee should have its own secretariat.

Biodiversity and socio-economic development

Indigenous plants and animals have long been used by the nation in traditional medicine. Certain plants in Malaysia have proven effective in preventing malaria and counteracting the HIV virus. The country recognizes the enormous economic potential of medicinally useful plants and is taking steps to tap into this market.

Philippines*Priorities*

The Philippines developed its Strategy for Biological Diversity Conservation in 1994 which was followed by the Philippine Biodiversity Assessment and Action Plan in 1997. In light of new information, approaches and analysis for biodiversity conservation provided through various initiatives, the Philippine Biodiversity Conservation Priority-setting Program (PBCPP) was designed to review existing plans, the results of which essentially comprise the “second iteration” of the NBSAP completed in 2002. The Philippines recognizes that a new culture of partnership-building and collaboration among a wide range of stakeholders and conservation practitioners is necessary for implementation of the second iteration to be successful. This document consolidates the most up-to-date information gathered from 300 natural and social scientists from local and international organizations, NGOs, academics, people’s organizations, donor communities and the private sector. This process was a breakthrough in that it was the first time that experts in terrestrial, inland waters and marine ecosystems and other critical stakeholders had gathered to strategize on national biodiversity conservation and related socio-economic issues.

PBCPP members reached consensus on 206 priority areas for conservation, and identified the following 5 elements as strategic actions, that fine-tune the 6 strategic actions contained in the 1997 NBSAP, for implementation:

1. Harmonize Research with Conservation Needs
2. Enhance and Strengthen the Protected Area System
3. Institutionalize Innovative and Appropriate Biodiversity Conservation Approaches: The Biodiversity Corridors
4. Institutionalize Monitoring and Evaluation Systems of Projects and of Biodiversity
5. Develop a National Constituency for Biodiversity Conservation in the Philippines

PBCPP results are meant to serve as a decision framework that policy-makers, national and local governments, civil society, academics, donor communities, local communities, and non-traditional stakeholders, such as the business community, can incorporate in their development programmes. Implementation success is illustrated by, for example, the inclusion of the NBSAP in the Philippine Medium Term Development Plan (1999-2004) and the National Land Use Policy at the regional level. In addition, an economic instrument for biodiversity conservation was created through a project formulated by the Department of Environment and Natural Resources.

Communication / Monitoring and reporting

Immediate actions were to include the creation of a multi-sectoral, multi-institutional mechanism entitled “Network for Nature” (N4N) to disseminate information, coordinate and monitor implementation. A main function of this mechanism is to ensure that partner organizations share responsibility with government agencies for implementation of PBCPP results and that information is disseminated as widely as possible.

Innovative approach

The Philippines has identified numerous biological corridors to efficiently manage and conserve biodiversity. Following the recommendation of the PBCPP marine working group to adapt the concept of biodiversity corridors, normally applied to terrestrial ecosystems, to marine ecosystems, nine marine corridors were identified. Notably, this was the first time this concept had been applied to marine ecosystems. Nineteen terrestrial and inland water corridors have also been identified. In total, these 28 corridors encompass 80% of the total area covered by the 206 conservation priority areas. Several corridor initiatives are currently under way.

Singapore*Priorities*

Singapore’s Green Plan 2012 (2006 Edition) follows up on Singapore’s Green Plan 2012 (2002 Edition). Seventeen thousand people took part in the review of the previous edition to contribute to the content of the current edition. Consultation was made possible through the convening of focus groups and through Internet surveys, public fora, climate change roundtables, public exhibitions, etc.

The 2006 edition covers six focus areas, namely, Air and Climate Change; Water; Waste Management; Nature; Public Health and International Environmental Relations. Singapore stresses close partnership among the public, private and people (3P) sectors in order to attain sustainable development through economic development, social progress and environmental sustainability. Key groups targeted include, among others, industry associations, businesses, NGOs, government officers of other agencies, academics, interest groups, youth and the community.

Targets included in the 2006 Edition that relate directly to biodiversity conservation are:

1. Keep nature areas for as long as possible.
2. Verify and update information on indigenous flora and fauna through biodiversity surveys.
3. Establish more parks and green linkages.
4. Set up a National Biodiversity Reference Centre.

Some activities suggested to implement these targets include the monitoring and updating of biodiversity information; establishment of new parks and park connectors; awareness-raising campaigns; development of a National Biodiversity Reference Centre. It should be noted that corporate funding has been obtained for educational and outreach projects related to biodiversity.

International cooperation through capacity-building partnerships with other developing countries, close collaboration with ASEAN countries and partners at regional and international levels on environmental matters, and honouring commitments to international environmental treaties, are also emphasized. Singapore strives to become an environmental hub for the exchange of environment and water technology and the host of international environmental events.

Best practices

Singapore is also taking the lead on regional efforts to implement the ASEAN Initiative on Environmentally Sustainable Cities (AIESC), launched in September 2005, and also chairs the ASEAN Working Group on Environmentally Sustainable Cities. A total of 24 cities in the 10 ASEAN countries are currently participating in the AIESC.

Increasing environmental awareness among youth groups is attached a lot of importance. In 2006 and 2007, the country hoped to jointly host youth conferences with partners such as UNEP.

Thailand

Priorities

Prior to CBD ratification in 2004, Thailand developed its first National Policy, Strategies and Action Plan on the Conservation and Sustainable Use of Biodiversity for the 1998-2002 period. The second NBSAP covers the 2003-2007 period. At present, only the annex of the second NBSAP, listing elements of the strategy and related actions in point form, is available in English through the National CHM website of Thailand.

The Strategy comprises the following 7 elements:

1. Enhance knowledge, understanding and public awareness in the importance and value of biodiversity.
2. Building capacity and expertise of institutions and their staff on the biodiversity conservation.
3. Strengthen capacity in conservation, restoration and protection of natural habitats, within and outside the protected areas.
4. Increase efficiency in the conservation and sustainable use of species and genetic diversity.
5. Control, regulate, and reduce the threats to biodiversity.
6. Provide incentives and encourage public participation for the conservation of biodiversity in accordance with traditional Thai cultural practices.
7. Promote and develop cooperation between international agencies/institutions in the conservation and sustainable utilization of biodiversity.

Implementation activities for the second strategy element include capacity-building for NGOs and private sector in biodiversity conservation. Activities for sixth strategy element stress the use of benefits from ecotourism as an economic incentive in biodiversity conservation and sustainable use.

Communication

Specific targets and indicators related to communication include:

- Promote the education on the basic knowledge of biodiversity and public awareness in every age group to the minimum 50% of the entire population in each province and every local administrative organizations, by the year 2007.
- Develop and harmonize the biodiversity database of every institution/organization. Keep them updated and linked together as “Thailand’s Biodiversity Information Network” by the year 2004.
- Develop “the Biodiversity Conservation Network” which has the unity nationwide, by the year 2007. Building capacity of the people and local administrative organizations on the conservation and sustainable use of biodiversity at least 40% of the country’s total area.

- Support the education and improve laws or regulations on the access to biological resources, technological transfer and benefit sharing, by the year 2007.

Vietnam

Priorities

Vietnam adopted its Biodiversity Action Plan (BAP) in 1995. A draft Biodiversity Action Plan to 2010 and Vision toward 2015 has also been completed. This draft has not been made available to the Secretariat and therefore the following text will deal with the 1995 BAP only.

Representatives of all levels of government, local and international scientists and academics, planners, managers, local communities and resource users participated in open discussions and workshops during the preparation of this plan. Vietnam had previously developed the National Conservation Strategy (1985), the National Plan for Environment and Sustainable Development (1991) and the Tropical Forestry Action Plan (1991) to address environmental and biodiversity problems. The BAP differs from these documents in that it advocates a comprehensive and integrated approach to biodiversity conservation that is integrally linked to the general development process. Partnerships with local communities and provincial-level governments are stressed and, in this sense, the BAP is a more “bottom up” approach to solving biodiversity problems than its predecessors.

The BAP draws attention to three new elements of biodiversity conservation: marine conservation, wetlands conservation and conservation of agricultural biodiversity, and also places more emphasis on international aspects of biodiversity protection. As such, it serves as a tool to clarify Vietnam’s responsibilities with its immediate neighbours in regard to transfrontier reserves, data sharing, expertise sharing, management of migrating species, spread of fire, trade and other issues. Broader issues such as global warming, marine pollution, international wildlife trade, global programmes and conventions are also taken into account. And, the BAP focuses more attention on the values and uses of biological diversity. Matters of access to and sovereignty over biodiversity resources are discussed to safeguard the country’s long-term economic potential. Finally, the BAP goes into the details of planning a protected areas system by reviewing up-to-date information and examining the country on remote sensed satellite images.

The Biodiversity Action Plan consists of 59 project profiles, arranged by policy programmes, management and conservation field programmes and complementary actions, for implementation over the course of three phases. Many of the first phase projects focus on planning, establishing institutional arrangements, awareness-raising and training. The others target the protection of threatened biodiversity. This should be done during the first two or three years. Phase II is a consolidation phase which should last for an additional two to three years. Phase III will cover those early Phase projects which require follow-up implementation and evaluation, and also focus on the development of provincial biodiversity plans and regional biodiversity issues. It also covers the management of biodiversity which at the time of drafting of the Plan was not greatly threatened. Lessons learned in the first two Phases would be passed onto new projects during the last Phase.

Recommended actions are identified for various institutions including the State Planning Committee, Ministry of Science, Technology and Environment, Ministry of Forestry, Ministry of Public Health and the Ministry of Education as important first steps. A range of other groups such as local communities, people’s committees, customs departments, NGOs, hospitals, tourism companies, town committees, local schools are also assigned responsibilities later on in the implementation period.

Communication

Courses have been prepared for primary and secondary grade school use and as parts of university degrees and diplomas however are not yet mandatory or widely used across the country. The Ministry of Education has taken the decision to review these courses, referring to similar courses developed in other Asian countries (e.g., India), and to make them mandatory at all schools and learning institutions in the country as formal biodiversity education in environmental education programmes.

Improving public awareness about biodiversity conservation and environmental issues in general is clearly a high priority. A large environmental awareness project, financed by UNDP and implemented by MOSTE and the Youth Union, is currently ongoing to build national capacities to design and implement integrated mass media campaigns for environmental awareness.

Monitoring and reporting

Many Government institutions have responsibilities in managing the use of natural resources. These responsibilities are not always clear, and sometimes overlap. Conflicts also arise between agencies which have a similar mandate but a different objective. It is therefore important to review and re-structure the institutional arrangements. The BAP recommends that a comprehensive study of institutional responsibilities be carried out to improve inter-sectoral coordination and linkages at the national, provincial and district levels.

Biodiversity and socio-economic development

The revised statement of Forestry Strategies given by the Ministry of Forestry (May 1993), based on Decision No. 327 of the Council of Ministry, is a great improvement in terms of biodiversity conservation compared to the previous forestry policy in Vietnam. For the first time, the emphasis is placed on forest protection rather than forest production, and the plan to involve local people in a forest conservation programme was expected to be effective. Decision No. 327 has clarified several ways in which the people will become more involved in forest protection:

- a) Local people will be employed in forest restoration.
- b) Local people will be given long-term use of forest which they restore.
- c) Local people will be paid to protect existing forest and allowed to extract some products.
- d) Local people will be paid for fire fighting work and rewarded when there are no fires.
- e) Local people will be given sedentarisation help to enable them to subsist on smaller, permanent areas of land over which they will have greater security of tenure.
