

Law and National Biodiversity Strategies and Action Plans



Publication: Law and National Biodiversity Strategies and Action Plans

Produced by the Law Division for the United Nations Environment Programme

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Acknowledgment

Thanks are due to Yolanda Saito (International Development Law Organization), Jiri Hlavacek (United Nations Environment Programme), Maria Socorro Manguiat (United Nations Environment Programme), Sylvia Bankobeza (United Nations Environment Programme) Susan Wekesa (United Nations Environment Programme), Katharina Rogalla von Bieberstein (World Conservation Monitoring Centre), John Tayleur (World Conservation Monitoring Centre) for their inputs and contributions. Particular thanks go to Eunice Jerono Odhiambo (United Nations Environment Programme) and Paula Wambui Waibochi (United Nations Environment Programme) for their significant work on analysing the National Biodiversity Strategies and Action Plans. Comments received from other experts, colleagues and partners are also gratefully acknowledged.

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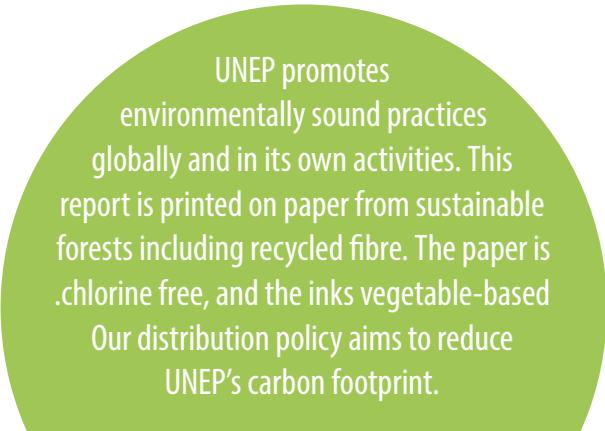
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Citation: United Nations Environment Programme (2018). *Law and National Biodiversity Strategies and Action Plans*, Nairobi, Kenya.



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Table of contents

| | | |
|------|--|----|
| I. | Introduction..... | 1 |
| | Definitions..... | 4 |
| II. | National biodiversity strategy and action plans (NBSAPs)..... | 7 |
| A. | What is an NBSAP?..... | 8 |
| B. | Developing NBSAPs..... | 8 |
| C. | Revision of NBSAPs..... | 11 |
| D. | Granting NBSAPs legal backing within the Convention on Biological Diversity..... | 11 |
| III. | Legal preparedness: biodiversity law..... | 15 |
| A. | Introduction..... | 16 |
| B. | Defining biodiversity law..... | 17 |
| C. | Nexus between biodiversity law and NBSAPs..... | 18 |
| D. | Development of biodiversity law..... | 20 |
| E. | International biodiversity law..... | 23 |
| | (a) Sources of international biodiversity law..... | 23 |
| | (b) Multilateral environmental agreements..... | 23 |
| | (c) Customary law..... | 24 |
| | (d) General principles of law..... | 25 |
| F. | Relationship between international and national biodiversity law..... | 25 |
| G. | National biodiversity law..... | 28 |
| | (a) The national legal status of biodiversity..... | 28 |
| | (b) Scope of the national biodiversity legal framework..... | 29 |
| IV. | Legal preparedness..... | 31 |
| A. | What exactly is meant by the term "legal preparedness"?..... | 32 |
| B. | Why is legal preparedness for NBSAPs important for biodiversity conservation?..... | 32 |
| C. | Design and applicability..... | 33 |
| V. | Strengthening and sustaining legal preparedness in NBSAPs..... | 35 |
| A. | Expanding biodiversity conservation through legal preparedness..... | 36 |
| B. | Basic elements for strengthening and sustaining legal preparedness in the NBSAPs process..... | 37 |
| | Institutional structures and professional competencies..... | 37 |
| C. | Access to information and data on the NBSAPs process, related legislation, best practice and policies..... | 39 |
| D. | Coordination mechanisms across jurisdictions and sectors..... | 40 |
| E. | Ministerial and departmental levels..... | 40 |
| | (a) Local and municipal levels..... | 41 |
| | (b) Advisory bodies..... | 41 |
| | (c) Courts and tribunals..... | 42 |
| | (d) Indigenous and local communities..... | 34 |

| | | |
|-------|--|----|
| F. | Accountability framework..... | 44 |
| VI. | NBSAPs and the Aichi Biodiversity Targets..... | 45 |
| | Legal preparedness for the Aichi Biodiversity Targets..... | 46 |
| | Conclusions..... | 56 |
| VII. | Review of legal considerations within NBSAPs..... | 57 |
| | Methodology..... | 58 |
| | Research limitations..... | 59 |
| | Data review and findings..... | 59 |
| | Extent to which parties have developed NBSAPs..... | 59 |
| | Parties with a post-2010/up-to-date NBSAPs..... | 62 |
| | Parties that have reviewed their laws related to biodiversity..... | 68 |
| | Legal measures in NBSAP..... | 68 |
| | Compilation of findings..... | 69 |
| | Compilation of post-2010 findings..... | 70 |
| VIII. | Sources..... | 73 |
| | Conventions and protocols..... | 74 |
| | Resolutions and decisions..... | 74 |
| | Publications and reports..... | 62 |
| | Training modules..... | 77 |
| | Website links..... | 81 |
| | Case law..... | 83 |
| | Other sources..... | 84 |



Introduction

1. Introduction

The contributions of biodiversity and ecosystems to human development and well-being have long been recognized.^{1,2} However, the world continues to lose its biodiversity as a result of both direct and indirect pressures, including habitat destruction, overexploitation, the spreading of invasive alien species, climate change and population pressure. National, bilateral and multilateral efforts to halt and reverse the loss have given rise to a number of legal, regulatory and policy regimes that are currently under implementation.³

While the policy and regulatory regimes are intended to provide an overarching framework for action on the ground, legal regimes and instruments provide the interpretation and protection services necessary for ensuring that policy and regulatory regimes are effectively implemented. The implementation referred to in the present paper usually takes place at the national level.

The Convention on Biological Diversity (“the Convention”)⁴ was adopted in 1992 at the United Nations Conference on Environment and Development, also known as “the Rio Earth Summit”, held in Rio de Janeiro, Brazil, from 3 to 14 June 1992, with the objectives of ensuring the conservation of biological diversity, the sustainable use of its components and the fair and equitable sharing of the benefits arising

out of the utilization of genetic resources, including by appropriate access to genetic resources and by appropriate transfer of relevant technologies, taking into account all rights over those resources and to technologies, and by appropriate funding.⁵ The Convention entered into force on 29 December 1993.

By its article 6 (a), the Convention requires parties to develop national strategies, plans or programmes for the implementation of the Convention at the national level. In doing so, each party shall “integrate, as far as possible and as appropriate, the conservation and sustainable use of biological diversity into relevant sectoral or cross-sectoral plans, programmes and policies”,⁶ as well as the “consideration of the conservation and sustainable use of biological resources into national decision-making”.⁷ Articles 6 and 10 (a) of the Convention exhibit strong linkages between the development of national biodiversity strategies, plans or programmes and the achievement of article 10 on the sustainable use of components of biological diversity. In that regard, it has been suggested that the implementation of the Convention could be achieved through the means of national biodiversity strategies and action plans (NBSAPs).⁸ NBSAPs thus constitute the key policy-cum-strategy document for the realization of the objectives of the Convention by many of the Convention’s parties. While as at March 2018, out of the 196 parties to the Convention, 190 had submitted their

1 “Updated analysis of information in the fourth national reports”, available at <https://www.cbd.int/doc/meetings/cop/cop-10/information/cop-10-inf-02-en.pdf>.

2 Millennium Ecosystem Assessment (2005).

3 Snape, William J. (1996).

4 Convention on Biological Diversity, preamble. Available at <https://www.cbd.int/doc/legal/cbd-en.pdf>.

5 Convention on Biological Diversity, article 1.

6 Convention on Biological Diversity, article 6 (b).

7 Convention on Biological Diversity, article 10 (a).

8 Convention on Biological Diversity, article 6.

NBSAPs⁹ to the Convention secretariat and 191 had provided their fifth national reports,¹⁰ outlining the ways in which the strategies had been implemented, nearly all countries have reported a continued decline in biodiversity.¹¹ The third edition of *Global Biodiversity Outlook*, published in 2010 taking into account the fourth national reports submitted by 178 parties, indicated that in many countries progress towards achieving the objectives of the Convention had been limited and has had little observable impact on the status and trends of biodiversity.¹² That lack of progress and impact led to the development of the Strategic Plan for Biodiversity 2011–2020, which was adopted as decision X/2 by the Conference of the Parties at its tenth meeting, held in Nagoya, Japan, from 18 to 29 October 2010¹³ and was supported by a set of twenty global biodiversity targets (“the Aichi Biodiversity Targets”)¹⁴ to reinvigorate national, regional and global action.¹⁵ By its decision XI/2, the Conferences of the Parties urged parties and other Governments to review and, as appropriate, update and revise their NBSAPs in line with the Strategic Plan for Biodiversity 2011–2020. Aichi Biodiversity Target 17 specifically addresses NBSAPs: “By 2015 each party has developed, adopted as a policy in-

strument, and has commenced implementing an effective, participatory and updated national biodiversity strategy and action plan”. A clarification on law and the Aichi Biodiversity Targets is provided in section VI below.

The Strategic Plan for Biodiversity 2011–2020 subsequently received broad support from other biodiversity-related conventions and the United Nations General Assembly, therefore positioning NBSAPs as an important instrument for a potential synergistic implementation of the biodiversity-related Conventions.

Following the adoption of decision X/2, countries began to review, revise and update their NBSAPs, both in the light of their implementation experience and of more recent developments, such as the focus on links with sustainable development. In addition, in paragraph 17 of decision XIII/1, the Conference of the Parties encouraged parties to ensure that their NBSAPs were adopted as policy instruments to enable the mainstreaming of biodiversity at all relevant levels across political, economic and social sectors. Almost all parties (97 per cent) have developed at least one NBSAP since they became a party, and this has formed the nucleus of their national action on the implementation of the Convention and the Strategic Plan for Biodiversity 2011–2020.¹⁶

One key element that has attracted the attention of those assessing the robustness and implementation effectiveness of NBSAPs has been the legal aspects of the NBSAPs and the nature of legal preparedness at the national level to

9 Convention on Biological Diversity, National Biodiversity Strategies and Action Plans (NBSAPs). Available at <https://www.cbd.int/nbsap/>.

10 In its decision XIII/27 on national reporting, the Conference of the Parties to the Convention on Biological Diversity at its thirteenth meeting, held in Cancun, Mexico, from 4 to 17 December 2016, provided guidelines, including reporting templates, for the sixth national reports due by 31 December 2018.

11 Note by the Executive Secretary of the Convention on Biological Diversity entitled “Update on progress in revising/updating and implementing national biodiversity strategies and action plans, including national targets” (UNEP/CBD/COP/13/8/Add.1), presented to the Conference of the Parties to the Convention at its thirteenth meeting on 17 December 2016. See also the note by the Executive Secretary of the Convention on Biological Diversity entitled “Update on progress in revising/updating and implementing national biodiversity strategies and action plans, including national targets” (CBD/SBI/2/2/Add.1), to be presented to the Subsidiary Body on Implementation at its second meeting, to be held in Montreal, Canada, from 9 to 13 July 2018.

12 Secretariat of the Convention on Biological Diversity (2010).

13 Decision X/2, on the Strategic Plan for Biodiversity 2011–2020 and the Aichi Biodiversity Targets, adopted by the Conference of the Parties to the Convention at its tenth meeting.

14 Ibid.

15 Decision X/8, on the United Nations Decade on Biodiversity 2011–2020, adopted by the Conference of the Parties to the Convention at its tenth meeting.

16 Update on progress in revising/updating and implementing national biodiversity strategies and action plans, including national targets (CBD/SBI/2/2/Add.1). Note to be presented by the Executive Secretary of the Convention on Biological Diversity to the Subsidiary Body on Implementation at its second meeting, to be held in Montreal, Canada, from 9 to 13 July 2018.

implement them.^{17,18} While countries continue to establish legislation and legal frameworks to implement NBSAPs and address biodiversity problems, much of the experience is based on the use of national sectoral policies and legislation related to biodiversity, and there is thus a clear need to further analyse the legal components of the present NBSAPs, the role of legal preparedness in the implementation of NBSAPs focusing on biodiversity, and ecosystems as an overarching theme, rather than as a sectoral issue. The aim of such an analysis is not simply to replace the narrow sectoral perspective with a broader cross-sectoral focus on biodiversity and ecosystems, but to widen the scope on the NBSAPs even further to include the concept of sustainable development.

The present paper therefore attempts to provide an overview of current thinking and the experience of countries in using legal frameworks to implement the Convention at the national level through NBSAPs and provides options for enhancing legal preparedness in revising and implementing the NBSAPs and the Strategic Plan for Biodiversity 2011–2020 and achieving the Aichi Biodiversity Targets.

Definitions

The following definitions have been used in the present paper, drawn largely from the Convention on Biological Diversity.

Access and benefit-sharing refers to the way in which genetic resources may be accessed, and how the benefits that result from their use are shared between the people or countries using the resources (users) and the people or countries that provide them (providers).¹⁹

Biodiversity means biological diversity.

Biological diversity means the variability among living organisms from all sources including, inter alia, terrestrial, marine and other aquatic ecosystems and the ecological complexes of which they are part; this includes diversity within species, between species and of ecosystems.²⁰

Biodiversity law means legal instruments and mechanisms regulating certain behaviour, providing incentives to achieve certain biodiversity conservation objectives and setting appropriate institutions to respond to the biodiversity needs and demands of society.²¹ For the purpose of the present publication, biodiversity law shall include legislation/acts of parliament, decree law, and local bylaws.

Biological resources include genetic resources, organisms or parts thereof, populations or any other biotic component of ecosystems with actual or potential use or value for humanity.

Biotechnology means any technological application that uses biological systems, living organisms or derivatives thereof to make or modify products or processes for specific use.²²

Decision means a formal expression of the will of the governing body of an international organization or international agreement. Decisions are generally binding but may occasionally be “soft law”.

Ecosystem means a dynamic complex of plant, animal and microorganism communities and their non-living environment, interacting as a functional unit.

¹⁷ Balakrishna, Pisupati and Christian Prip (2015).

¹⁸ International Development Law Organization (2016b).

¹⁹ Secretariat of the Convention on Biological Diversity, Introduction to access and benefit-sharing.

²⁰ Convention on Biological Diversity, article 2.

²¹ de Klemm, Cyrille, and Clare Shine (1993).

²² Convention on Biological Diversity, article 2.

Ecosystem services mean the benefits that people obtain from the ecosystem. These include provisioning services, such as food, water, timber and fibre; regulating services that affect climate, floods, disease, waste and water quality; cultural services that provide recreational, aesthetic and spiritual benefits; and supporting services, such as soil formation, photosynthesis and nutrient cycling.²³

Ex-situ conservation means the conservation of components of biological diversity outside their natural habitats.

Genetic resource means all living organisms – plants, animals and microbes – carrying genetic material that could potentially be of use to humans.²⁴

In-situ conservation means the conservation of ecosystems and natural habitats and the maintenance and recovery of viable populations of species in their natural surroundings and, in the case of domesticated or cultivated species, in the surroundings where they have developed their distinctive properties.

Legal means biodiversity processes that conform to the law; are done according to law; are required or permitted by law; are not forbidden by law; or are good and effectual in law.²⁵

Legal preparedness means the ability of a country to ensure implementation of the Convention in a manner prescribed by national law that is aligned with the objectives of the Convention. It involves putting in place the elements needed to make laws work on the ground, including commitment to inclusive legal reform processes, capacity-building of authorities and legal empowerment of civil society towards a collaborative approach to the implementation of laws.²⁶

²³ Millennium Ecosystem Assessment (2005).

²⁴ Secretariat to the Convention on Biological Diversity, Introduction to access and benefit-sharing.

²⁵ Black, Henry Campbell (1968).

²⁶ International Development Law Organization (2016a).



Measure means the rule by which biodiversity processes are governed, adjusted or proportioned.²⁷

Multilateral environmental agreement means treaties, conventions, protocols and other binding instruments related to the environment.

Policy means the general principles by which a Government is guided in its management of public affairs, or application of legislature, law, ordinance or rule of law, in its measures.²⁸

Policy instrument means interventions made by a Government or public authority at the local or national levels with the aim to achieve outcomes that conform to the national objectives related to biodiversity.²⁹

Protected area means a geographically defined area that is designated or regulated and managed in such a way as to achieve specific conservation objectives.

Sustainable use means the use of components of biological diversity in a way and at a rate that does not lead to a long-term decline in biological diversity, thereby maintaining its potential to meet the needs and aspirations of present and future generations.³⁰

Utilization of genetic resources means to conduct research and development on their genetic and/or biochemical composition.³¹

27 Black, Henry Campbell (1968).

28 Black, Henry Campbell (1968).

29 Adopted from the definition of "policy instrument" in Know Hub, available at <http://www.know-hub.eu/knowledge-base/videos/policy-instruments.html>.

30 Article 2 of the Convention on Biological Diversity.

31 Biber-Klemm, Susette, and Sylvia I. Martinez (2016).



National biodiversity strategy
and action plans (NBSAPs)

II. National biodiversity strategy and action plans (NBSAPs)

A. What is an NBSAP?

An NBSAP is an integrated, multisectoral, participatory instrument for national biodiversity planning.³² It is a process by which countries plan the conservation of biological diversity, the sustainable use of its components and the fair and equitable sharing of the benefits arising out of the utilization of genetic resources, by outlining and addressing the threats to their biodiversity and biodiversity resources.³³

From a legal perspective, NBSAPs are key instruments and tools for translating the measures set out in the Convention on Biological Diversity, and in other biodiversity-related conventions, into national action and for creating a path to the achievement of concrete outcomes.³⁴ NBSAPs are intended to identify and prioritize national targets within the framework of the Strategic Plan for Biodiversity 2011–2020 and the Aichi Biodiversity Targets and the actions required to meet those targets in order to fulfil the national objectives related to biodiversity.

B. Developing NBSAPs

The Convention on Biological Diversity is a broad global framework for the conservation of biological diversity, the sustainable use of its components and the fair and equitable sharing of the benefits arising out of the utilization of genetic resources, including by appropriate access to

genetic resources and by appropriate transfer of relevant technologies, within which parties develop the measures necessary to achieve its objectives. The Convention does not list species or habitats to be protected, but parties are required to develop national strategies, plans and programmes for the conservation of biodiversity and the sustainable use of biological resources.³⁵

By its decision IX/8, on the review of implementation of goals 2 and 3 of the Strategic Plan, the Conference of the Parties to the Convention at its ninth meeting called upon parties to ensure that NBSAPs are action-driven, practical and prioritized, and provide an effective and up-to-date national framework for the implementation of the three objectives of the Convention, its relevant provisions and relevant guidance developed under the Convention, and take into account the principles of the Rio Declaration on Environment and Development, adopted at the United Nations Conference on Environment and Development.

The secretariat of the Convention and other partners, including the United Nations Environment Programme and the United Nations Development Programme, provide NBSAP training modules, which offer guidance on the development of NBSAPs.³⁶ Those organizations also developed the NBSAP forum,³⁷ which is an online community of practice to support the revision and implementation of NBSAPs by connecting a wide range of stakeholders, providing access

³² Convention on Biological Diversity, Training module 1: An Introduction to National Biodiversity Strategies and Action Plans.

³³ *Ibid.* See also Convention on the Conservation of Migratory Species of Wild Animals (2015).

³⁴ Convention on Biological Diversity, article 6.

³⁵ Birnie, Patricia W., and Alan E. Boyle (1995).

³⁶ Convention on Biological Diversity, NBSAP Capacity Building Modules.

³⁷ <http://nbsapforum.net>.

1. A total of 49 NBSAPs¹ have been adopted as “whole-of-government” instruments:
 - (a) The NBSAPs of Cambodia, Croatia, India, Georgia, Germany, Guyana, Hungary, Japan, Myanmar, Nepal, Norway, Seychelles, Sri Lanka, Thailand, Tuvalu, Ukraine and Zimbabwe were adopted/endorsed by their cabinets or an equivalent body;
 - (b) The councils of ministers of Belarus, Bosnia and Herzegovina, Benin, Chile, Greece, Luxembourg, Mauritania, Poland and the Sudan approved their NBSAPs;
 - (c) The NBSAPs of Azerbaijan, Cambodia, France and Spain were approved by their Heads of Government;
 - (d) The NBSAP of Costa Rica is part of the National Biodiversity Policy (2015–2030) adopted by decree;
 - (e) The NBSAP of the European Union was adopted by the Commission and endorsed by the Council of Ministers and the European Parliament;
 - (f) The NBSAP of Sweden was adopted by the Parliament.
2. Six NBSAPs (Australia, Bhutan, Dominican Republic, Guatemala, Lithuania and Tajikistan) have been adopted as instruments applying to the environmental sector.
3. Fifteen other countries (Afghanistan, Antigua and Barbuda, Burundi, Guinea, Jordan, Kiribati, Lebanon, Mauritania, Mauritius, Philippines, Romania, Samoa, Solomon Islands, Swaziland and Uganda) have stated intent to adopt their NBSAPs as a policy instruments.

Source: *Convention on Biological Diversity, NBSAP Analysis for the Subsidiary Body on Implementation, 2018.*

to timely information, an e-learning platform, best practices, guidance and resources regarding NBSAPs.

An NBSAP should, inter alia, take into account the goals and targets of the Strategic Plan for Biodiversity 2011–2020. The NBSAP is intended to be an evolving strategic instrument for achieving concrete outcomes, and not a scientific study, review or publication that sits on a shelf. It should also include an action plan outlining the ways in which national action required to meet the national biodiversity targets and to fulfil the objectives of the Convention at the national level will be implemented.³⁸

In addition, NBSAPs should address the objectives of other biodiversity-related conventions³⁹ and highlight the contribution of biodiversity and ecosystem services

to human well-being, poverty eradication and national development, as well as the economic, social and cultural values of biodiversity.⁴⁰

Although the NBSAP may take the form of a single biodiversity-planning document, and many countries have chosen that form, it does not necessarily have to be the case. In paragraph 17 of decision XIII/1, the Conference of the Parties encouraged parties to adopt NBSAPs as policy instruments to enable biodiversity mainstreaming at all relevant levels of decision-making. This is in line with Aichi Biodiversity Target 17, which aims for each party to having developed, adopted as a policy instrument, and commenced implementing an effective, participatory and updated national biodiversity strategy and action plan by 2015. In some cases, the implementation timeframes of the NBSAPs can differ and vary greatly. As shown in the tables below,

³⁸ Convention on Biological Diversity, Training module 2.

³⁹ Pisupati, Balakrishna, and Christian Prip (2015).

⁴⁰ Decision IX/8 of the Conference of the Parties to the Convention, on the review of implementation of goals 2 and 3 of the Strategic Plan.

the NBSAPs can be adopted through a combined effort of different government authorities, including royalty, cabinets and councils of ministers or as a single process within the environmental sector.⁴¹

NBSAPs may also incorporate principles, priorities, policies, instruments, mechanisms, processes and programmes that the country has identified as a means to achieve the objectives of the Convention.⁴² For example, as of March 2018:

- ❖ Eighteen NBSAPs outlined a national capacity development plan (Bosnia and Herzegovina, Botswana, Burundi, Comoros, Guyana, Indonesia, Lebanon, Liberia, Malawi, Maldives, Mali, Mauritius, Morocco, Nigeria, Niue, Rwanda, Suriname and Timor-Leste).⁴³
- ❖ Eighty-eight other NBSAPs outlined a number of capacity-building activities and required resources (Algeria, Andorra, Argentina, Armenia, Austria, Azerbaijan, Bangladesh, Burkina Faso, Bahrain, Belize, Botswana, Brazil, Cabo Verde, Cambodia, Cameroon, Chad, Czechia, Chile, China, Comoros, Congo, Croatia, Cuba, Democratic Republic of the Congo, Djibouti, Dominica, Egypt, Eritrea, Georgia, Greece, Grenada, Guatemala, Guinea-Bissau, Guinea, Guyana, Honduras, Hungary, India, Iran (Islamic Republic of), Iraq, Ireland, Japan, Jordan, Kiribati, Lao People's Democratic Republic, Lebanon, Liechtenstein, Lithuania, Luxembourg, Madagascar, Malawi, Malaysia, Maldives, Mali, Mauritania, Mexico, Mozambique, Myanmar, Namibia, Nauru, Nepal, Nicaragua, Niger, Paraguay, Peru, Philippines, Poland, Republic of Korea, Republic

of Moldova, Romania, Saint Kitts and Nevis, Senegal, Serbia, Seychelles, Sierra Leone, Slovakia, South Africa, Sri Lanka, Sudan, Swaziland, Tajikistan, Togo, Tuvalu, Uganda, Uruguay, United Kingdom of Great Britain and Northern Ireland, Zambia and Zimbabwe).⁴⁴

In order to be effective, it is important that NBSAPs should be jointly developed, adopted and owned by a broad range of interested societal groups. For example, 36 NBSAPs have reported the involvement of indigenous and local communities;⁴⁵ 91 NBSAPs have reported the involvement of non-governmental organizations and civil society groups;⁴⁶ 47 NBSAPs have reported the involvement of the private sector;⁴⁷ and 64 NBSAPs have reported the involvement

44 Ibid.

45 Ibid. Algeria, Argentina, Brazil, Burundi, Cameroon, Colombia, Costa Rica, Democratic Republic of the Congo, Ethiopia, Finland, Gambia, Ghana, Grenada, Guatemala, Guyana, Honduras, Indonesia, Japan, Malawi, Mexico, Namibia, Paraguay, Peru, Philippines, Senegal, Sierra Leone, Solomon Islands, South Africa, Sri Lanka, Suriname, Thailand, Togo, Uganda, Venezuela (Bolivarian Republic of), Yemen and Zambia.

46 Ibid. Afghanistan, Algeria, Andorra, Antigua and Barbuda, Argentina, Bahrain, Bangladesh, Belarus, Belgium, Belize, Bhutan, Bosnia and Herzegovina, Brazil, Burundi, Cabo Verde, Cameroon, Chile, Colombia, Congo, Costa Rica, Côte d'Ivoire, Croatia, Democratic Republic of the Congo, Djibouti, Dominica, Dominican Republic, Equatorial Guinea, Eritrea, Estonia, Ethiopia, Finland, France, Gambia, Georgia, Ghana, Greece, Grenada, Guatemala, Guinea, Guyana, Honduras, Hungary, Indonesia, Iraq, Ireland, Jamaica, Japan, Kiribati, Lao People's Democratic Republic, Lebanon, Liberia, Liechtenstein, Lithuania, Malawi, Maldives, Mauritius, Mexico, Mongolia, Myanmar, Mozambique, Myanmar, Namibia, Nauru, Nigeria, Paraguay, Peru, Philippines, Rwanda, Saint Kitts and Nevis, Samoa, Senegal, Serbia, Seychelles, Sierra Leone, Solomon Islands, Somalia, South Africa, Spain, Sri Lanka, Sudan, Swaziland, Tajikistan, Thailand, Timor-Leste, Togo, Uganda, United Republic of Tanzania, Uruguay, Yemen, Zambia and Zimbabwe.

47 Ibid. Algeria, Bahrain, Belize, Brazil, Cabo Verde, Cameroon, Chile, Colombia, Congo, Croatia, Dominica, Dominican Republic, Estonia, Finland, France, Gambia, Georgia, Guatemala, Guinea, Guyana, Iraq, Jamaica, Japan, Kiribati, Lao People's Democratic Republic, Malawi, Maldives, Mauritius, Mozambique, Namibia, Paraguay, Peru, Philippines, Rwanda, Solomon Islands, Somalia, Spain, Sri Lanka, Sudan, Swaziland, Switzerland, Thailand, Togo, Uganda, United Republic of Tanzania, Uruguay and Yemen.

41 Update on progress in revising/updating and implementing national biodiversity strategies and action plans, including national targets (CBD/SBI/2/2/Add.1).

42 Convention on Biological Diversity, Training module 2.

43 Update on progress in revising/updating and implementing national biodiversity strategies and action plans, including national targets (CBD/SBI/2/2/Add.1).

of academia.⁴⁸ The process for developing NBSAPs must therefore be open, participative and transparent.⁴⁹ NBSAPs must also include measures to mainstream biodiversity into sectoral and cross-sectoral policies and programmes. Countries may benefit from having legislation in place that dictates and mandates the undertaking of the above processes.

C. Revision of NBSAPs

NBSAPs should be regarded as living documents, by which information and knowledge gained through implementation, monitoring and evaluation is fed back into a permanent and continuous review process, which results in the periodic updating and revision of the NBSAP.

Although most countries (79 per cent) have developed and submitted NBSAPs that take into the account the Strategic Plan for Biodiversity 2011–2020, some are outdated.⁵⁰ The NBSAP process includes continual monitoring and evaluation as progress is made and lessons are learned in the light of the country's specific conditions and resources. Parties have been requested by the Conference of the Parties to the Convention under decision X/2 to revise their NBSAPs in line with the Strategic Plan for Biodiversity and Aichi Biodiversity Target 17. Circumstances affecting biodiversity that were not foreseen at the time of developing the NBSAP may also trigger revision.

48 Ibid. Afghanistan, Algeria, Argentina, Bahrain, Bangladesh, Belize, Bosnia and Herzegovina, Brazil, Cabo Verde, Cambodia, Chile, Colombia, Côte d'Ivoire, Dominican Republic, Equatorial Guinea, Eritrea, Estonia, Ethiopia, Finland, France, Gambia, Georgia, Ghana, Guatemala, Honduras, Iran (Islamic Republic of), Iraq, Ireland, Jamaica, Japan, Jordan, Lao People's Democratic Republic, Kyrgyzstan, Lebanon, Malawi, Mauritius, Mexico, Mongolia, Morocco, Mozambique, Myanmar, Namibia, Nigeria, Paraguay, Philippines, Samoa, Senegal, Serbia, Seychelles, Sierra Leone, Somalia, Spain, Sri Lanka, Swaziland, Tajikistan, Thailand, Timor-Leste, Togo, Uganda, United Republic of Tanzania, Uruguay, Yemen, Zambia and Zimbabwe.

49 Global Development Research Centre, The Rio Summit's Principle 10 and its Implications.

50 NBSAP Forum; see also Pisupati, Balakrishna, and Christian Prip (2015).

Legal preparedness creates predictability and flexibility in the efforts of countries to identify priorities and align their biodiversity conservation plans with their broader national goals, across all sectors and through relevant sectoral or cross-sectoral plans, programmes and policies. Such priorities and plans should be fully incorporated into national development, accounting and planning processes and should also be taken into consideration in both the development and revision of NBSAPs.

To establish a strong legal preparedness status, countries will need to assess how well their existing NBSAPs incorporate relevant laws, make use or afford the use of existing legal mechanisms and institutions, address existing biodiversity conditions, accommodate the Aichi Biodiversity Targets and identify key constraints and opportunities.

D. Granting NBSAPs legal backing within the Convention on Biological Diversity

Unless a different intention appears from the text of the Convention or is otherwise established, a treaty is binding upon each party in respect of its entire territory.⁵¹ In that regard, the Convention is legally binding upon each party, and an NBSAP is, by virtue of being founded in article 6 of the Convention, a legally backed instrument, especially if argued so within the confines of the Vienna Convention on the Law of Treaties. The legal backing is necessary for enhancing the NBSAP process, empowering or triggering action amongst the parties, providing political or social recourse, limiting actions and, given that legally backed documents are difficult to repeal, providing a sense of permanence and sanctioned life to the NBSAP process.⁵²

51 Vienna Convention on the Law of Treaties, 1969, article 29. Available at <https://treaties.un.org/doc/Publication/UNTS/Volume%201155/volume-1155-I-18232-English.pdf>.

52 Van Dyke, Fred (2008).

Article 6: General measures for conservation and sustainable use

Each party shall, in accordance with its particular conditions and capabilities:

- (a) Develop national strategies, plans or programmes for the conservation and sustainable use of biological diversity or adapt for this purpose existing strategies, plans or programmes which shall reflect, inter alia, the measures set out in this Convention relevant to the party concerned; and
- (b) Integrate, as far as possible and as appropriate, the conservation and sustainable use of biological diversity into relevant sectoral or cross-sectoral plans, programmes and policies.

Source: *Convention on Biological Diversity, 1992.*

Although NBSAPs, as key instruments and tools for the implementation of the Convention, have since the entry into force of the Convention been developed and have in most cases survived without specific legislation, it is undeniable that they would benefit significantly from legal empowerment and support.⁵³ In fact, throughout the world today, biodiversity conservation and management issues are increasingly being founded, developed and established by legal instruments.⁵⁴

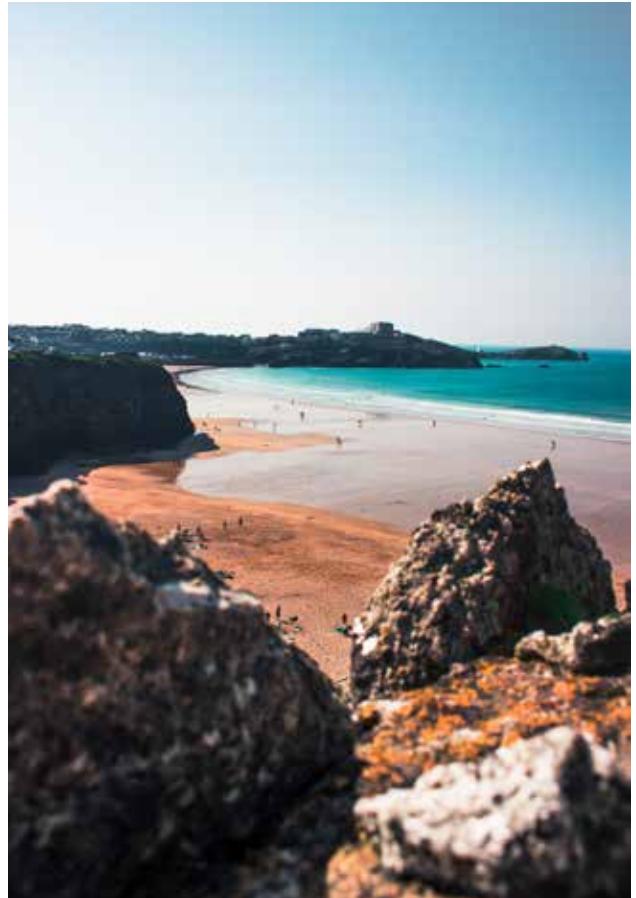
The development of an NBSAP is the necessary first step to performing the treaty obligation and integrating biodiversity issues and measures into national decision-making processes, as is specifically articulated in articles 6 (b) and 10 (a) of the Convention.

Article 10 of the Convention complements article 6 in calling for the mainstreaming of biodiversity into national decision-making.

The role of NBSAPs in guaranteeing that the objectives of the Convention are fulfilled by each party is emphasized in a number of decisions of the Conference of the Parties to the Convention. These include decision IX/8, which emphasizes that NBSAPs and equivalent policies and legislative frameworks are key implementation tools of the

⁵³ Ibid.

⁵⁴ Ibid.



Article 10: Sustainable use of components of biological diversity

Each party shall, as far as possible and as appropriate:

- (a) Integrate consideration of the conservation and sustainable use of biological resources into national decision-making;
- (b) Adopt measures relating to the use of biological resources to avoid or minimize adverse impacts on biological diversity;
- (c) Protect and encourage customary use of biological resources in accordance with traditional cultural practices that are compatible with conservation or sustainable use requirements;
- (d) Support local populations to develop and implement remedial action in degraded areas where biological diversity has been reduced; and
- (e) Encourage cooperation between its governmental authorities and its private sector in developing methods for sustainable use of biological resources.

Source: *Convention on Biological Diversity, 1992.*

Convention and therefore play an important role in achieving the Aichi Biodiversity Targets,⁵⁵ an emphasis that is further recognized by decision X/2.⁵⁶ Furthermore, decision X/10 on national reporting: review of experience and proposals for the fifth national report calls upon parties to provide quantitative analysis and synthesis on the status of implementation of the Convention, in particular the Strategic Plan for Biodiversity 2011–2020 and national biodiversity strategies and action plans.⁵⁷

⁵⁵ Decision IX/8 of the Conference of the Parties to the Convention, para. 2.

⁵⁶ Decision X/2 of the Conference of the Parties to the Convention, para 3 (d).

⁵⁷ Decision X/10 of the Conference of the Parties to the Convention, on national reporting: review of experience and proposals for the fifth national report, para. 9 (b).

Conclusions

1. An NBSAP is an integrated, multisectoral, participatory instrument for national biodiversity planning and conservation.
2. NBSAPs are key instruments and tools for translating the measures set out in the Convention on Biological Diversity, and in other biodiversity-related conventions, into national action and for creating a path to the achievement of concrete outcomes. NBSAPs are also key instruments and tools for implementing the goals of the strategic plan(s) for biodiversity and global targets adopted by the Conference of the Parties, in addition to the goals of the Convention.
3. Article 6 (a) of the Convention on Biological Diversity requires each party to develop national strategies, plans or programmes for the conservation and sustainable use of biological diversity or adapt for this purpose existing strategies, plans or programmes which shall reflect, inter alia, the measures set out in the Convention relevant to the party concerned. This requirement is very broad and allows for differentiated responses by parties.
4. Article 10 (a) of the Convention requires each party to integrate consideration of the conservation and sustainable use of biological resources into national decision-making to enable biodiversity mainstreaming at all relevant levels within political, economic and social sectors.
5. In order to achieve Aichi Biodiversity Target 17, it was required that "by 2015, each party has developed, adopted as a policy instrument, and has commenced implementing an effective, participatory and updated national biodiversity strategy and action plan". This has been reiterated in paragraph 17 of decision XIII/1.
6. NBSAPs may take the form of a single biodiversity-planning document within the environment sector or the framework of a complex biodiversity conservation structure adopted by a variety of authorities, including royalty, cabinets and councils of ministers.
7. The variety and format of NBSAPs is an important factor for creating guidance manuals and for the Conference of the Parties to decide on more specific requirements. Parties make a significant effort to use guidance and adhere to agreed formats.
8. The present obligations and format relating to the development and revision of an NBSAP falls within Article 6 (b) of the Convention on Biological Diversity and negotiations and decisions of the twelfth and thirteenth meetings of the Conference of the Parties relating to mainstreaming and integrating the conservation and sustainable use of biodiversity into relevant sectoral or cross-sectoral plans, programmes and policies. Future discussions on NBSAPs could be informed by these developments and processes.
9. Biodiversity-related laws create predictability and flexibility in the efforts of countries to identify priorities and align their biodiversity conservation plans with their broader national goals, plans, programmes and policies.

A photograph of St Paul's Cathedral in London at dusk, viewed from the Sky Garden. The cathedral's large dome is the central focus, illuminated against a grey sky. In the foreground, a modern walkway with a curved metal railing leads towards the cathedral. To the left, a brick building features the City of London School logo, which includes a red cross on a white shield surrounded by a crown and other heraldic elements. Several people are walking on the bridge, some looking towards the cathedral. The overall atmosphere is quiet and historic.

Legal preparedness: biodiversity law

III. *Legal preparedness: biodiversity law*

A. Introduction

Biodiversity is a national, regional and international governance issue and law is a necessary condition for its conservation, management and sustainable use. Law provides rules and institutional mechanisms whereby action on biodiversity and ecosystems can be taken, and establishes a framework that supports countries in their efforts to achieve biodiversity objectives, both in response to national priorities and needs and in terms of commitment to addressing global biodiversity issues. It provides the foundation for governmental policies and actions to conserve and manage biodiversity and ecosystems and, by establishing relevant boundaries and social safeguards, it can ensure that benefits arising out of the utilization of genetic resources are shared in a fair and equitable manner. Law can also act as an empowering tool, by creating incentives and recognizing rights and responsibilities to engage local governments, individuals, indigenous peoples, local communities, entrepreneurs, businesses and others to take action for biodiversity.⁵⁸

Significant progress is being made towards having enhanced biodiversity legislation in place at the national, international and regional levels. That is evident in the adoption of various unilateral, bilateral and multilateral instruments that establish higher standards for biodiversity conservation and management. From those processes, biodiversity law has emerged as a central tenet for the conservation and sustainable use of biodiversity and ecosystems.

Although biodiversity law is not a stand-alone branch of law, it is recognized as an extension of international law.⁵⁹ Biodiversity law is implemented at the national level and the extent of its growth and implementation varies between countries. It is arguable that developed countries have in place enhanced legal frameworks for biodiversity in comparison with developing countries, including small island developing States.⁶⁰ However, taking into consideration the broader scope of laws that contribute to the realization of the objectives of the Convention, as will be seen in chapter VII, developed and developing country laws are tailored to fit each country's circumstances, and a distinction would be a subject in futility. All countries however need laws that are specifically tailored and accompanied with enforcement procedures and mechanisms to ensure implementation of the obligations set out in the Convention on Biological Diversity and other biodiversity-related conventions. Compliance refers to countries meeting their obligations under the Convention whereas enforcement refers to the range of procedures and actions employed by a State, its competent authorities and agencies to ensure that they comply with the Convention.⁶¹ Also, in many countries, compliance and enforcement of biodiversity laws may not be given priority because of other competing laws and development activities.

⁵⁹ Snape, William J. (1996); Bodansky, Daniel M. (1995).

⁶⁰ Islam, Nazrul, and others (2001).

⁶¹ United Nations Environment Programme (2002), part I, p.9. See also United Nations Environment Programme (2006), pp.19–20.

⁵⁸ International Development Law Organization (2016a).

While approaching biodiversity law as a core pillar of the development, revision and implementation of NBSAPs, this section of the present paper will define biodiversity law, explore its development and evaluate its impact on and relevance to the NBSAP process. It will also review legal norms, including unilateral, bilateral and multilateral environmental agreements and principles. A number of instruments relevant to the development, revision and implementation of NBSAPs will be reviewed and analysed with a view to determining the ways in which enhanced biodiversity legal preparedness can contribute to the revision and implementation of NBSAPs and the 2020 and post-2020 biodiversity agendas.

B. Defining biodiversity law

An increasing number of jurisdictions have developed and implemented biodiversity law, the objective of which is to ensure the conservation and sustainable use of biodiversity, as well as the equitable distribution of the benefits and costs derived therefrom.⁶²

The preamble to the Convention on Biological Diversity recognizes biodiversity as a resource of intrinsic value, over which States have sovereign rights, as well as the responsibility to conserve and use it in a sustainable manner.⁶³



Article 3: Principle

States have, in accordance with the Charter of the United Nations and the principles of international law, the sovereign right to exploit their own resources pursuant to their own environmental policies, and the responsibility to ensure that activities within their jurisdiction or control do not cause damage to the environment of other States or of areas beyond the limits of national jurisdiction.

Convention on Biological Diversity, 1992.

⁶² Biodiversity Law no. 7788 of 1998 (as amended), Costa Rica.

⁶³ Convention on Biological Diversity, preamble.

As regards the governance of biodiversity, the adoption of the Convention marked the departure from the *res nullius* concept towards the principle of State sovereignty. The principle can be read into article 3 of the Convention, under which State sovereignty allows countries to enact legislation and to use and conserve biodiversity within their jurisdiction, while taking into consideration their international commitments as well as their national circumstances and capabilities.

Although it can be argued that the current levels of membership and implementation of the Convention are sufficiently high for a universal definition of biodiversity to be customarily established, the present paper does not seek to presume that that is the case. Various scholars, institutions and stakeholders differ in the way in which they define biodiversity and it therefore follows that there is no specific definition of biodiversity law that is universally accepted and applied. Snape, for example, takes biodiversity law a step further than many other commentators by defining it as a law that describes not only the rules imposed upon human beings as a species, but also the vast and powerful rules thrust upon us by nature.⁶⁴

For the purposes of the present analysis, biodiversity law is understood to be the branch of law that seeks to regulate the use, management, conservation and fair and equitable distribution of the benefits arising from the use of the components of biodiversity and ecosystems, with the aim of helping to fulfil the needs and aspirations of both present and future generations.

In that respect, the analysis will recognize and establish biodiversity law as a central platform on which institutions, policies, compliance and enforcement regimes, as well as

international biodiversity governance at various levels, can be built to regulate the use of and interaction with biodiversity.

C. Nexus between biodiversity law and NBSAPs

Although NBSAPs are government-approved biodiversity documents, they are not binding legal texts. However, the fact that legal, policy and institutional framework are required as a tool for their effective design, revision and implementation has long been established.⁶⁵ The International Development Law Organization has reported that, in the implementation of NBSAPs, law contributes to setting a clear biodiversity agenda; mainstreaming biodiversity into national priorities; enshrining biodiversity principles in decision-making; setting a legal basis for biodiversity policies and planning across the various sectors and levels of government; setting out clear mandates for cross-cutting biodiversity institutions; building stakeholder confidence in biodiversity conservation processes and incentives; recognizing community rights and relevance of customary laws; and building equity, justice and fairness into biodiversity-related outcomes.⁶⁶

On a substantive scale, an NBSAP legal framework will include legislation, regulations and policy; legally defined institutional arrangements; regulatory mechanisms (including command and control, incentives, voluntary or participatory approaches, permits, certification and standards). In addition, a framework will also include mechanisms to ensure both compliance and enforcement.

Before 2010, legal instruments and mechanisms were not mentioned in most NBSAPs.⁶⁷ However, since 2010, legal instruments and mechanisms for the conservation

⁶⁴ Snape, William J. (1996).

⁶⁵ Nagoya Declaration on Parliamentarians and Biodiversity. Available at <https://www.cbd.int/doc/meetings/biodiv/parli-nagoya/official/parli-nagoya-declaration-en.pdf>.

⁶⁶ International Development Law Organization (2016b).

⁶⁷ Ibid.

of biodiversity and ecosystems have become concrete subjects of discussion.⁶⁸ However, despite the progress on the discussions, the process remains weak and few countries have been successful in reducing legal fragmentation, filling gaps and resolving inconsistencies, restructuring institutions, modifying decision-making processes and engaging stakeholders in the legislation process.

Jonathan Charney has identified the following elements, among others, as key substantive aspects that can be employed in overcoming the above-mentioned weaknesses and enhancing legal preparedness for NBSAPs:⁶⁹

- (a) Strong governance of the components of biodiversity through the establishment of local, regional and national biodiversity bodies with participatory, transparent and accountable decision-making;
- (b) Broad integration of biodiversity considerations into all policies and strategies, including those governing climate change, forestry, land use, agriculture and marine management;
- (c) Creation of linkage between measures undertaken to fulfil the Convention objectives on conservation, sustainable use and access and benefit-sharing arising from the utilization of genetic resources;
- (d) Establishment of a synergistic implementation plan for biodiversity-related conventions and obligations;
- (e) Development of a comprehensive scope of legislation that addresses relevant convention obligations;
- (f) Provision of mechanisms for consultation and incorporation of indigenous and local communities and other relevant stakeholders into decision-making;

- (g) Establishment of legal in-situ and ex-situ biodiversity conservation measures, including protected areas;
- (h) Creation of modalities that enable, integrate and reward the sustainable use of biodiversity;
- (i) Development of appropriate monitoring and compliance mechanisms to monitor the ongoing loss of biodiversity and related conservation processes;
- (j) Protection, promotion and assurance of fair and equitable benefit-sharing from the use of traditional knowledge, innovations and practices pertaining to biodiversity;
- (k) Inclusion of the precautionary principle, the ecosystem approach and the preventive approach as principles of interpretation and implementation;
- (l) Development mechanisms for capacity-building, awareness-raising, incentivizing conservation and technology transfer.

Furthermore, in their review of biodiversity legislation in eight jurisdictions (Costa Rica, European Union, India, Japan, Norway, South Africa, Republic of Korea and Viet Nam), Cabrera, Phillips and Welch determined that the incorporation of the following mechanisms into new and existing legislation is a key tool for implementation, monitoring and revision of biodiversity legislation:⁷⁰

- (a) Financing mechanisms that are integrated into laws or policies to ensure the effective long-term implementation of the law and related Convention objectives;
- (b) A strong legal institutional structure with the power to govern implementation and the ability to leverage sanctions or penalties to encourage compliance;
- (c) Well-established procedures for review, revision

⁶⁸ Ibid.

⁶⁹ Charney, Jonathan (1995).

⁷⁰ Jorge Cabrera Medaglia and others (2012); Cabrera Medaglia, Jorge, Freedom-Kai Phillips and Frederic Perron-Welch (2014).

and refinement, based on the collection of relevant information pertaining to biodiversity conservation and the status of implementation;

- (d) Suitable modalities for public participation among stakeholders at all levels in the implementation, monitoring, review and revision of the legal framework in a synergistic manner, giving consideration to the five goals of the Strategic Plan for Biodiversity 2011–2020 and the Aichi Biodiversity Targets.⁷¹

Current reforms of biodiversity legislation tend to focus on protecting habitats, ecosystems and species. However, direct factors of biodiversity loss do not act in isolation.⁷² Efforts to reduce direct pressures are curtailed by underlying indirect factors. Indirect factors determine, among other things, the demand for natural resources and are much more difficult to control. There is a need to address such indirect factors legally alongside direct factors.⁷³ Failure to consider indirect factors at the national level will result in NBSAPs that are not an integral part of the wider social, policy, legal and institutional framework.⁷⁴

D. Development of biodiversity law

A general overview of the development of biodiversity law reveals that it emerged and developed in various phases.

In the first phase of its development, biodiversity law emerged as a tool to halt, control and prevent the overexploitation and

degradation of biodiversity. During this phase, jurisdictions and institutions enacted legislation focusing on biodiversity conservation. However, the legislation was species-specific. A general approach to biodiversity conservation was rare, but it was recognized that the continued loss of specific biological species urgently required specific attention.

In the second phase of its development, biodiversity law began to acknowledge the broad principle that the general conservation of biodiversity, including various specific species, could not be achieved without the preservation of their natural habitats. That shift in focus resulted in biodiversity legislation that sought to integrate and harmonize species and habitat conservation efforts.

During the third and current phase, the concept of sustainable development has gained significant traction in the legal world, and has been embedded in a number of regional and international legal instruments.⁷⁵ The need to address the impact of biodiversity loss on global development is now established and widely accepted.

The World Commission on Environment and Development, in its seminal 1992 publication, *Our Common Future*, recognized the need to redesign institutional mechanisms in a manner that reconciled human affairs with natural laws.⁷⁶ Paragraph 39 of the outcome document calls for the alteration of development patterns to make them more compatible with the preservation of the extremely valuable biological diversity of the planet.⁷⁷ In particular, the aim should be to enhance laws and regulations as the most important instruments for transforming environmental and

⁷¹ Decision X/2 on the Strategic Plan for Biodiversity 2011–2020. Available at <https://www.cbd.int/decision/cop/?id=12268>. See also Harry Jonas and Athene Dilke, Human Rights Standards for Conservation (November 2014) Supporting Document 2: Decisions of the Conference of the Parties to the Convention on Biological Diversity that reference Indigenous Peoples' and local communities rights and concerns: CBD COP VII, VIII, IX, X, and XI. Available at <http://pubs.ied.org/pdfs/G03848.pdf>.

⁷² Decision X/2 of the Conference of the Parties to the Convention (see footnote 13).

⁷³ Secretariat of the Convention on Biological Diversity (2010).

⁷⁴ Experience from the implementation of the Basic Act on Biodiversity of Japan, articles 10 and 11.

⁷⁵ Secretariat of the Convention on Biological Diversity (2010).

⁷⁶ International Court of Justice, *Gabčíkovo-Nagyymaros Project (Hungary/Slovakia)*. (ICJ Report, 1997, 7, 140).

⁷⁷ Report of the World Commission on Environment and Development: *Our Common Future*, para. 39. Available at <http://www.un-documents.net/our-common-future.pdf>.

development policies into action.⁷⁸ In that regard, States and people shall cooperate in good faith and in a spirit of partnership in the further development of international law in the field of sustainable development.⁷⁹

The *Our Common Future* report defines sustainable development as development that “meets the needs of the present generations without compromising the ability of future generations to meet their own needs”.⁸⁰

Within the United Nations system and the international community as a whole, sustainable development has been embedded in a number of resolutions, declarations, conventions and international judicial decisions.^{81,82} In particular, it is deeply engrained in the objects and purposes of a number of biodiversity-related conventions, including the Convention on Biological Diversity, its two protocols, the Cartagena Protocol on Biosafety to the Convention on Biological Diversity⁸³ and the Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from Their Utilization to the Convention



on Biological Diversity;⁸⁴ the United Nations Framework Convention on Climate Change,⁸⁵ its Kyoto Protocol⁸⁶ and the Paris Agreement;⁸⁷ the United Nations Convention to Combat Desertification in Those Countries Experiencing Serious Drought and/or Desertification, Particularly in Africa;⁸⁸ the Convention on the Conservation of Migratory Species of Wild Animals; the Convention on International Trade in Endangered Species of Wild Fauna and Flora; the International Treaty on Plant Genetic Resources for Food and Agriculture; the International Whaling Commission, and the International Plant Protection Convention.⁸⁹

78 World Commission on Environment and Development (1992), para. 2. United Nations Conference on Environment and Development (1992). Agenda 21, para. 8.13 (Rio de Janeiro, Brazil). Available at <https://sustainabledevelopment.un.org/content/documents/Agenda21.pdf>.

79 Rio Declaration on Environment and Development 1992, principle 27. Available at <http://www.jus.uio.no/lm/environmental.development.rio.declaration.1992/portrait.a4.pdf>.

80 Ibid 78, chapter 2, para 1. Rio Declaration on Environment and Development 1992, Principle 3.

81 Ibid 77.

82 General Assembly resolution 66/288, “The future we want” (27 July 2012). Available at http://www.un.org/ga/search/view_doc.asp?symbol=A/RES/66/288&Lang=E. International Court of Justice, *Gabčíkovo-Nagymaros* (see footnote 77); World Trade Organization, United States – Import Prohibition of Certain Shrimp and Shrimp Products, WT/DS58/AB/R, Report of the Appellate Body, 12 October 1998, para. 153 (the “Shrimp Turtle” case); United Nations Commission on Human Rights resolution 2003/71 of 25 April 2003 on human rights and the environment as part of sustainable development. Permanent Court of Arbitration: In the Arbitration Regarding the Iron Rhine (“Ijzeren Rijn”) Railway, between the Kingdom of Belgium and the Kingdom of the Netherlands (May 24, 2005). The 1995 Straddling Fish Stocks Agreement of the 1982 United Nations Convention on the Law of the Sea. 2001 Doha Declaration. 1992 Rio Declaration on Environment and Development.

83 Cartagena Protocol on Biosafety to the Convention on Biological Diversity, 2000.

84 Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from Their Utilization to the Convention on Biological Diversity, 2010.

85 United Nations Framework Convention on Climate Change, 1992.

86 Kyoto Protocol to the United Nations Framework Convention on Climate Change, 1998.

87 Paris Agreement, 2015 (under the United Nations Framework Convention on Climate Change).

88 United Nations Convention to Combat Desertification in Those Countries Experiencing Serious Drought and/or Desertification, Particularly in Africa, 1994.

89 International Treaty on Plant Genetic Resources for Food and Agriculture, November 2001.

The linkages between biodiversity and sustainable development have been clearly established. The Food and Agriculture Organization of the United Nations has presented that:

“Biodiversity provides people with basic ecosystem goods and services, including goods such as food, fibre and medicine, and services such as air and water purification, climate regulation, erosion control and nutrient cycling. Biodiversity also plays an important role in economic sectors that drive development, including agriculture, forestry, fisheries and tourism. More than three billion people rely on marine and coastal biodiversity, and 1.6 billion people rely on forests and non-timber forest products (e.g. the fruits from trees) for their livelihoods. Many people depend directly on the availability of usable land, water, plants and animals to support their families.”⁹⁰

The Convention on Biological Diversity secretariat has determined the Strategic Plan for Biodiversity 2011–2020 as an opportunity for sustainable development, with the 20 Aichi Biodiversity Targets relating not only to conservation, but also the mainstreaming of biodiversity across all sectors of government and society for a considerable change to lifestyles, and particularly to the development paradigm.^{91, 92}

The recognition of the interlinkages between biodiversity and development achieved a landmark milestone with the 2015 adoption by the General Assembly of the

Sustainable Development Goals under the 2030 Agenda for Development.⁹³

In paragraph 9 of resolution 70/1, on the 2030 Agenda for Sustainable Development, the General Assembly recognized that good governance and the rule of law, as well as an enabling environment at the national and international levels, are essential for sustainable development, including sustained and inclusive economic growth, social development, environmental protection and the eradication of poverty and hunger.⁹⁴ By the same resolution, the General Assembly adopted 17 Sustainable Development Goals and 169 targets related to those goals. The Goals and targets related to biodiversity and ecosystems lie across the 17 Goals, including two specifically on terrestrial and marine biodiversity and recognition of biodiversity values as key to achieving several other Goals and in particular Goal 15.9, which calls for integration of biodiversity values in national plans.⁹⁵ In addition, besides being deeply grounded in international law, the Goals take into consideration the provisions of various international legal instruments.⁹⁶ Recent studies have examined the ways in which the law can help to facilitate and accelerate the realization of the 2030 Agenda.⁹⁷ The present study surmises that this new approach to the Sustainable Development Goals is beneficial to the NBSAP process, as many countries and stakeholders are already focusing their national social, economic and political agendas on sustainable development.⁹⁸

At this point, however, it should be noted that the concept of sustainable development, in itself, does not constitute law. However, in this analysis, the linkage between

90 Terence Hay-Edie and Bilgi Bulus, GEF-Small Grants Programme Dominique and Bikaba, Strong Roots, Chapter 10, Biodiversity conservation and sustainable development. P.132 Available at <http://www.fao.org/docrep/017/i3157e/i3157e10.pdf>.

91 Secretariat of the Convention on Biological Diversity, March 2013, Biodiversity for Sustainable Development: Beyond environmental considerations, p.1. Available at <https://www.cbd.int/doc/newsletters/development/news-dev-2015-2013-03-en.pdf>.

92 Report of the World Summit for Social Development (Copenhagen Declaration and Programme of Action) 1995, para. 6 (A/CONF.166/9).

93 International Development Law Organization (2016a).

94 General Assembly resolution 70/1.

95 International Development Law Organization (2016a).

96 General Assembly resolution 70/1.

97 Kim, Rakhun E. (2016).

98 United Nations Environment Programme (2016c).

sustainable development, biodiversity law and NBSAPs is strictly approached and modelled on the contribution of sustainable development processes to the NBSAPs and to the development and implementation of biodiversity-related legislation.⁹⁹ In that regard, laws are modelled along the various sets of the 27 Rio Principles of sustainable development, including the precautionary principle, intergenerational equity and common, but differentiated, responsibility between countries.¹⁰⁰ The analysis further focuses on striking a balance between national conservation targets, strategies and plans on the one hand and the duty to give effect to international commitments on the other hand.¹⁰¹ States are encouraged to consider this approach in their development and implementation of NBSAPs.¹⁰²

E. International biodiversity law

International biodiversity law, having been founded within the confines of the biodiversity-related conventions and treaties, is fully part of international law. International law,¹⁰³ also called the law of nations, is the body of legal rules, norms and standards that apply between sovereign States and other entities that are legally recognized as international actors. In that regard, international biodiversity law can be viewed as all international law, both public and private, that deals with biodiversity issues, including the use of biodiversity and the sharing of the benefits arising therefrom.¹⁰⁴

Over the past 30 years, international biodiversity law has developed rapidly. Unilateral, bilateral and multilateral instruments have been adopted to address biodiversity issues at the national, regional and global levels. Those

instruments set out mechanisms, standards and procedures for the conservation and sustainable use of biodiversity, the sharing of benefits, the resolution of disputes, facilitating the implementation of goals and strategies and, in many cases, ensuring compliance with existing international treaties, customs and principles.¹⁰⁵

(a) Sources of international biodiversity law

Article 38 (1) of the Statute of the International Court of Justice establishes the traditional principal sources of international law, namely international conventions, whether general or particular; international custom, as evidence of a general practice accepted as law; general principles of law recognized by civilized nations; and judicial decisions and the teachings of the most highly qualified publicists of the various nations as subsidiary means for the determination of rules of law. There are, however, also other sources of law, which are broadly categorized as “soft law”.

(b) Multilateral environmental agreements

Multilateral environmental agreements (MEAs) are legally binding international instruments concluded between two or more nation States, governed by international law and dealing with specific or general environmental issues.¹⁰⁶ MEAs may take the form of treaties, agreements, conventions, covenants or protocols. For the purposes of the present paper, MEAs shall be taken to mean all those forms insofar as they establish a legal obligation for the protection and management of biodiversity.

As treaties, MEAs function as global legal frameworks enshrining the collective will of Governments to protect biodiversity and ecosystems. MEAs create binding international obligations between their parties. All parties to an MEA must perform their obligations in good faith and no

⁹⁹ Schrijver, Nico, and Friedl Weiss (2004).

¹⁰⁰ Rio Declaration on Environment and Development, 1992.

¹⁰¹ Barral, Virginie (2012).

¹⁰² Charney, Jonathan (1995).

¹⁰³ This approach is in line with the provisions of the Vienna Convention on the Law of Treaties, 1969 (see footnote 52).

¹⁰⁴ Teclaff, Ludwik A., and Albert E. Utton (1974).

¹⁰⁵ Birnie, Patricia, and others (2009).

¹⁰⁶ United Nations Environment Programme (2010).

party may invoke the provisions of its own domestic law to justify its failure to comply with an MEA obligation.¹⁰⁷ MEAs therefore establish a global legal regime, complementing national and regional legislation in the global effort to address biodiversity loss.¹⁰⁸

The effectiveness of any international agreement ultimately depends on the extent to which members comply with their specific treaty obligations. Most MEAs are specific, rather than open-ended, each with its own legally mandated institutions (such as the Convention on Biological Diversity and the protocols thereto).

(c) Customary law

A custom is a rule establishing binding obligations for States and other members of the international community except those that have persistently objected.¹⁰⁹ Customary law exists independent of treaty law. However, customary rules may inform the content of treaty law.¹¹⁰ Customary law related to biodiversity conservation is of crucial importance because it fills gaps and solves problems associated with the implementation of MEAs. It is a complementary source of law for enhancing biodiversity governance processes.

To establish customary law there must be evidence of State practice undertaken in the belief that the State was

bound to do so by law.¹¹¹ The practice does not have to be universal and the existence of practice seeking to undermine uniformity or universality may not prevent the formation of customary law.¹¹²

The practice must be uniform, extensive and representative.¹¹³ It must include that of States whose interests are specially affected.¹¹⁴ There are many nations specially affected by the continued loss and degradation of biodiversity that are not necessarily a party to all the biodiversity-related conventions. Their interest in biodiversity conservation and management can be said to have a customary legal implication, even if they are not a party to the Convention on Biological Diversity or any of the biodiversity-related conventions. Reciprocity is, in general, the basic source of any obligation to adhere to and implement customary law.

In biodiversity conservation, *opinio juris sive necessitatis* refers to the belief that state action towards the conservation of biodiversity and its resources is carried out as a legal obligation, duty or right.¹¹⁵ Without *opinio juris*, practice alone is not sufficient.¹¹⁶ The existence of obligation and practice on the conservation of biodiversity is, in this regard and as evidenced through the NBSAPs, based on a legal obligation. States not willing to be bound by that obligation may persistently object.¹¹⁷

107 Article 26 of the Vienna Convention on the Law of Treaties holds as follows: "Pacta sunt servanda: Every treaty in force is binding upon the parties to it and must be performed by them in good faith"; article 27 of the Convention holds as follows: Internal law and observance of treaties: "A party may not invoke the provisions of its internal law as justification for its failure to perform a treaty. This rule is without prejudice to article 46", article 46 governing the provisions of internal law regarding competence to conclude treaties.

108 United Nations Environment Programme, Law Division webpage on multilateral environmental agreements Support and Cooperation. Available at <http://web.unep.org/divisions/delc/our-work/env-governance-conventions/meas-support-and-cooperation>. Also refer to the United Nations Information Portal on Multilateral Environmental Agreements (InforMEA). Available at <https://www.informe.org/>.

109 Sands, Philippe, and others (2012).

110 Ibid.

111 International Court of Justice, *North Sea Continental Shelf, Judgment*, I.C.J. Reports 1969, p. 3.

112 International Court of Justice, *Military and Paramilitary Activities in and against Nicaragua (Nicaragua v. United States of America)*, Merits, Judgment, I.C.J. Reports 1986, p. 14.

113 International Court of Justice, *North Sea Continental Shelf Cases*.

114 Ibid.

115 Ibid.

116 International Court of Justice, *Legality of the Threat or Use of Nuclear Weapons, Advisory Opinion*, I.C.J. Reports 1996, p. 226. See also Permanent Court of International Justice, The case of the "S.S. LOTUS" (France vs. Turkey), Judgment, 1927.

117 International Court of Justice, *Colombian-Peruvian asylum case, Judgment of November 20th 1950*: I.C. J. Reports 1950, p. 266.

(d) General principles of law

While general principles of international biodiversity law cannot override or amend the provisions of the Convention or any other relevant MEAs, their importance and relevance in the development, application and interpretation of the law cannot be overestimated.

Various principles enshrined in the Declaration of the United Nations Conference on the Human Environment¹¹⁸ and the Rio Declaration on Environment and Development¹¹⁹ provide a basic code of environmental conduct and influence various stages of the conservation and management of biodiversity and ecosystems.¹²⁰

General principles of international law continue to acquire their force and legitimacy through continued application by States.¹²¹

The following table illustrates the ways in which various principles can apply to biodiversity law and the NBSAPs process.

F. Relationship between international and national biodiversity law

The application of international and national biodiversity legislation has enhanced countries' biodiversity conservation efforts.¹²² International biodiversity law has established rules and regulations that define biodiversity conservation efforts and obligations between sovereign States. National biodiversity law, in contrast, defines and governs biodiversity

conservation efforts, obligations and actions of citizens and entities within the territories of a sovereign State.

The question that remains is whether international and national biodiversity laws exist independently, with one being superior to the other, or dependently, in which case they cooperatively complement one another. The next few paragraphs present two different legal theories that different countries have chosen to adopt in their implementation of international law. The purpose of this analysis is not to present that one approach is correct over the other.

The monist and dualist theories have both attempted to answer the above question.

The dualist theory draws a line that distinguishes between international and national biodiversity laws.¹²³ Proponents of the dualist theory argue that international biodiversity law exists independently of national biodiversity law and can only take effect within the national legal framework following the enactment of appropriate national legislation.¹²⁴ That approach identifies international and national biodiversity laws as distinct legal bodies that regulate similar issues at divergent levels and therefore holds that international biodiversity law must be reconciled with national biodiversity law through specific legislation before it can be enforced at the national level.¹²⁵

In contrast, monist theorists argue that international biodiversity laws and national biodiversity laws are unitarily, dependently and inter-reliantly part of the same legal system and that international law is undeniably superior to national

118 United Nations Environment Programme, Declaration of the United Nations Conference on the Human Environment, Stockholm, 5 to 16 June 1972. Available at <http://www.un-documents.net/aconf48-14r1.pdf>.

119 Rio Declaration on Environment and Development, 1992.

120 Handl, Günther. Declaration of the United Nations Conference on the Human Environment (Stockholm Declaration) 1972 and the Rio Declaration on Environment and Development 1992.

121 International Court of Justice, *Gabčíkovo-Nagymaros* (see footnote 77).

122 Snape, William J. (1996); see also Mitchell, Andrew, and Jennifer Beard (2009).

123 Rose, Gregory L. (2011); see also Bodansky, Daniel, Jutta Brunnée and Ellen Hey (eds.) (2007); and Bodansky, Daniel, and Jutta Brunnée (1998).

124 Brownlie, Ian (2008).

125 Ibid.

| PRINCIPLE | APPLICATION TO BIODIVERSITY LAW AND NBSAPS |
|--|---|
| The safeguarding of biodiversity principle | ❖ Adverse effects on biodiversity shall be avoided or prevented at all costs. |
| The sustainable development principle | ❖ All activities shall take biodiversity into account so that the needs of present and future generations are met. |
| The sustainable use principle | ❖ Parties and stakeholders should reduce and eliminate unsustainable patterns of production and consumption and promote appropriate demographic policies. |
| The principle to take precautionary action | <ul style="list-style-type: none"> ❖ Parties and stakeholders should take precautions to protect and conserve biodiversity; ❖ Where there are threats of serious or irreversible damage, scientific uncertainty shall not be used to postpone cost-effective measures to prevent biodiversity degradation; ❖ The diverse needs of various stakeholders having an interest in biodiversity shall be taken into consideration. |
| The principle of non-discrimination | <ul style="list-style-type: none"> ❖ The full participation of women is essential to biodiversity conservation; ❖ The creativity, ideals and courage of youth and the knowledge of indigenous people should be taken into consideration; ❖ The identity, culture and interests of indigenous people and other relevant stakeholders should be taken into consideration. |
| The non-degradation principle | <ul style="list-style-type: none"> ❖ Adverse effects on biodiversity should be avoided or prevented at all costs; ❖ Institutions and stakeholders should ensure that any actions they authorize, fund or carry out do not degrade biodiversity. |
| The public participation and access to information and justice principle | <ul style="list-style-type: none"> ❖ Biodiversity issues are best handled with the participation of all concerned citizens; ❖ Nations shall facilitate and encourage public awareness and participation by making biodiversity information widely available. |
| The principle of common but differentiated responsibilities | <ul style="list-style-type: none"> ❖ Nations shall cooperate to conserve, protect and restore biodiversity; ❖ Developed countries should acknowledge the responsibility that they bear in the conservation and sustainable use of biodiversity, taking into consideration the pressures which their societies, technologies and financial resources place on biodiversity. |
| The polluter pays principle | ❖ Those responsible for activities that cause or are likely to cause damage to biodiversity should bear the cost of pollution. |
| The integration principle | <ul style="list-style-type: none"> ❖ Biodiversity conservation shall constitute an integral part of the development process, and cannot be considered in isolation from it; ❖ Biodiversity conservation policies should be integrated into other related policies. |
| Preventive principle | ❖ Significant impact on biodiversity shall be assessed, halted, reversed and minimized in advance and in a timely manner. |
| The Source principle | ❖ Causes of biodiversity loss or degradation shall be anticipated, identified, prevented and attacked at the source. |

law.¹²⁶ On that basis, national courts are able to directly apply and enforce international biodiversity legislation without requiring specific national legislation to provide enforceability.

The present analysis takes the approach that monism and dualism are merely methods by which States apply existing international biodiversity laws within their sovereign territories. In that regard, the approach of each sovereign State to international biodiversity legislation is generally determined by its national Constitution. Whether a State adopts a monist approach (for example, Austria, Chile,

China, Columbia, Egypt, France, Germany, Japan, Mexico, Netherlands, Poland, Russian Federation, South Africa, Switzerland and Thailand) or a dualist approach (for example, Australia, Canada, India, Israel and the United Kingdom of Great Britain and Northern Ireland) is merely a presentation of its preferred method for giving effect to international biodiversity law within a national legal framework.¹²⁷

Despite clear constitutional laws that recognize the status of international law, the federated political system may mean that ultimately States may also have some limited authority to regulate areas of environmental matters. For



¹²⁶ Rose, Gregory L. (2011); see also Watts, Arthur, and C.J. Greenwood (eds.) (1955); and Kelsen, Hans (1945).

¹²⁷ Rose, Gregory L. (2011); see also Sands, Philippe, and others (2012).

instance, the United States of America, may appear to be neither monist nor dualist or both monist and dualist. Article VI of the Constitution of the United States of America states as follows: "This Constitution, and the laws of the United States which shall be made in pursuance thereof; and all treaties made, or which shall be made, under the authority of the United States, shall be the supreme law of the land; and the judges in every state shall be bound thereby, anything in the Constitution or laws of any state to the contrary notwithstanding."¹²⁸ Furthermore, the high degree of flexibility that exists in international law creates an environment in which international biodiversity law depends upon the will and capacity of each State to implement. The implementation levels thus vary from one country to another, with the end goal being to meet the agreed international biodiversity conservation and management goals and objectives, to the extent that international biodiversity law is consistent with existing national biodiversity laws and circumstances.¹²⁹ With variations from one legal system to another, in instances of conflict between national and international biodiversity legislation, national legislation may prevail over conflicting international legislation, although international legislation may form an influential base of consideration.

G. National biodiversity law

Each country has its own specific sources of law, which may include a constitution, legislation, judicial decisions and ratified treaties. Executive, agency and departmental regulations and orders adopted and applicable within the territory also form part of national legislation. National legislation is, therefore, the general body of laws applicable within a defined territory over which a sovereign power has jurisdiction.

In its resolution 1803 (XVII) of 14 December 1962 on permanent sovereignty over natural resources, the General Assembly declared that the exploration, development and disposition of natural resources should be in conformity with the rules and conditions which the peoples and nations freely consider to be necessary or desirable.¹³⁰

Principle 2 of the Rio Declaration on Environment and Development holds that "States have, in accordance with the Charter of the United Nations and the principles of international law, the sovereign right to exploit their own resources pursuant to their own environmental and developmental policies."¹³¹ The principle is further emphasized in article 3 of the Convention on Biological Diversity.

The provisions set out above provide a general overview of the right of a State to direct and determine the use of its natural resources through national laws and practices and will be discussed in greater detail in the following two sections.

(a) *The national legal status of biodiversity*

Countries have the right, as well as an obligation, to enact legislation to control and regulate the exploitation of biodiversity within their jurisdiction. This sovereign act and right is exercised through acts of parliament, judicial decisions, executive orders, regulations and policies. National laws derive their power and mandate from national constitutions, which are the supreme sources of State authority. Constitutions also provide a legal framework for taking into consideration existing indigenous practices and jurisprudence.

¹²⁸ Constitution of the United States of America, 1787, article VI. Available at <http://constitutioncenter.org/media/files/constitution.pdf>.

¹²⁹ Durwood Zaelke, Donald Kaniaru and Eva Kruzikova (eds.) (2005).

¹³⁰ General Assembly resolution 1803 (XVII), 14 December 1962. Available at <http://www.ohchr.org/EN/ProfessionalInterest/Pages/NaturalResources.aspx>.

¹³¹ Rio Declaration on Environment and Development 1992, principle 2.

National laws address biodiversity in a variety of ways. Article 59 of the Constitution of Albania holds that the State aims to ensure a healthy and ecologically appropriate environment for current and future generations and the rational use of forests, water, pastures and other natural resources based on the principle of sustainable development.¹³² The Constitution of Bhutan decrees that the country shall maintain a minimum of 60 per cent of its total land area under forest cover for all time and emphasizes that it is the fundamental duty of the Government and the people to conserve and improve the environment and safeguard the biodiversity of the country.¹³³

Some legislation vests ownership of biodiversity and ecosystems in the State, as is the case in Benin, Brazil, China, Colombia, the Congo, the Democratic Republic of the Congo, Mexico and Zambia.¹³⁴ In certain jurisdictions, legislation addresses all classes of biodiversity generally, as is the case in Australia, while others deal only with specific categories of biodiversity, as is the case in Papua New Guinea and Saint Vincent and the Grenadines. In the latter situation, classes of biodiversity not specifically dealt with in such legislation ultimately remain *res nullius*,¹³⁵ a matter which will be discussed in greater depth later in the present paper.

Within the context of national biodiversity laws, State sovereignty offers a number of advantages. Biodiversity legislation criminalizes the illegal exploitation of biodiversity and biodiversity resources; control over transborder

movements regulates the transboundary movement of biodiversity products; national laws and policies establish territorial practices that largely contribute to the adoption and enforcement of multilateral environmental agreements, meaning that a State may impose civil damages, fines and any other penalty prescribed or device mandated by the relevant legislation in respect of various biodiversity issues.

(b) Scope of the national biodiversity legal framework

National legislation and regulation is important to the realization of NBSAPs and the implementation of biodiversity-related conventions.

The national biodiversity legal framework encompasses a range of legislation applicable to the conservation of a diverse range of biodiversity resources, including water, marine and coastal resources, land, forests and wildlife. The legislation establishes national institutions and mandates them, through appointed conservation officials and focal points, to undertake relevant conservation activities and processes. The conservation officials and focal points may play a specific or a general role in biodiversity-related conventions and projects.

National biodiversity legislation has an important role to play in ensuring that public authorities regularly collect and update environmental information; establish systems to ensure an adequate flow of information; develop public participation procedures and emphasize the need for such participation; eliminate conflict between laws; promote full implementation; reduce confusion among stakeholders; and ensure openness and transparency.

Despite the progress that has been made, many national reports still do not indicate sufficient integration of biodiversity issues into broader national legal and policy regimes; nor is the value of biodiversity always fully

¹³² Albania NBSAP. Available at <https://www.cbd.int/doc/world/al/al-nbsap-v2-en.pdf>.

¹³³ Constitution of the Kingdom of Bhutan, 2008, articles 5.1 and 5.3. Available at <http://www.nationalcouncil.bt/assets/uploads/files/Constitution%20of%20Bhutan%20English.pdf>.

¹³⁴ Supreme Court of the United States of America, *Douglas v. Seacoast Products, Inc.*, 431 U.S. 265 (1977).

¹³⁵ The Environment Protection and Biodiversity Conservation Act of Australia 1999. Available at <https://www.environment.gov.au/epbc>; the Fauna (Protection and Control) Act of Papua New Guinea 1966; the Wildlife Protection Act of Saint Vincent and the Grenadines 1987. All available at <http://www.ecolex.org/>.

accounted for.¹³⁶ From a general review of NBSAPs, legal fragmentation and weak institutional provisions are evident, a situation that will be analysed in detail later in the present paper.

There is a clear need to review existing legislation and policy with a view to identifying lacunae and obstacles that hinder the effectiveness of the legislation. There is also a need to facilitate the provision of advisory services and technical assistance to countries to enable them to develop



Source: IDLO, *Building Legal Preparedness for Biodiversity Targets: why law matters for success?*

or strengthen the necessary legislation and policy frameworks. The review should take into account current challenges based on lessons learned, and the principles laid down in the pursuit of sustainable development, which is especially important in view of the challenges posed by fragmentation and the ad hoc nature of most national biodiversity policies, laws and institutions.

Likewise, countries should, when developing and updating their NBSAPs, identify specific and emerging biodiversity problems; evaluate the adequacy of existing legislation; review the legislative options; and design a legal framework for controlling, preventing or correcting any problems identified. Comparative information on the ways in which other jurisdictions manage their biodiversity may also be of use.

Conclusions

- 1) Law is a necessary condition for the conservation, management and sustainable use of biodiversity.
- 2) Legislation and policy instruments will continue to play a key role in the NBSAP process.
- 3) For enhanced legal preparedness, relevant institutions and stakeholders should undertake a comprehensive legal and policy analysis to determine the challenges and obstacles associated with existing biodiversity-related legal options or policies. The analysis should also include a way to overcome legal and policy barriers and challenges. Competent authorities should be mandated and equipped to collect and update information on law and NBSAPs regularly. NBSAP-related legislation should establish effective and consistent public participation procedures (as is the case, for example, under the constitutions of South Africa and Kenya); access to information procedures with clear mandates for policymakers, non-governmental institutions, central and local authorities, community and private sector actors (as is the case, for example, in Mexico); information disclosure guidelines and codes for transparency (such as the publication schema of the United Kingdom of Great Britain and Northern Ireland); and supreme decrees and voluntary openness strategies (such as those seen in Peru, Argentina and the Plurinational State of Bolivia).
- 4) The legislation would also serve as mechanisms for establishing approaches and principles that would guide and enhance biodiversity-related compliance and enforcement procedures.
- 5) Broad and comprehensive tools for assessing the adequacy of national biodiversity legal frameworks are usually required with regard to the development and revision of NBSAPs.

¹³⁶ Pisupati, Balakrishna, and Christian Prip (2015).

¹³⁷ International Development Law Organization, 16 October 2014, *Building Legal Preparedness for Biodiversity Targets: why law matters for success?* Available at <https://www.cbd.int/financial/cop12event/idlo-legal.pptx>.



Legal preparedness

IV. Legal preparedness

The present chapter will analyse legal preparedness for NBSAPs implementation by applying an approach that is as broad as possible to achieve a better understanding of the role of the law in the development, implementation and revision of NBSAPs. Furthermore, the concept of legal preparedness has been extended, for the purposes of the present chapter, to mean the ability of parties to the Convention to have in place legal instruments and policy systems for biodiversity conservation, and the legal readiness to use them to achieve their goals and objectives for the conservation of biological diversity, sustainable use of its components and the fair and equitable sharing of benefits arising out of the utilization of genetic resources.

In that regard, the chapter will articulate the importance of the law in the implementation of NBSAPs; review the current status of legal preparedness of NBSAPs and of ongoing efforts to strengthen that preparedness; and set out a clear, preliminary approach to achieving and sustaining legal preparedness for NBSAPs. The chapter will feature the experiences of a number of governmental entities to illustrate that strengthening legal preparedness for NBSAPs will have valuable biodiversity benefits. The overall aim is to demonstrate that legislation can be used to ensure preparedness for the conservation and management of biodiversity.

A. What exactly is meant by the term “legal preparedness”?

Legal preparedness can be understood both in a generic sense and from a more technical perspective. Broadly

speaking, legal preparedness may be seen as having in place a substantive group of constitutional, legislative, regulatory, jurisprudential and sectoral or cross-sectoral rules and policies that together establish and enhance processes of biodiversity conservation and sustainable use. That group of laws constitutes substantive law, which is the body of rules that determine the rights and obligations of biodiversity conservation bodies and sectors.

In a more technical sense, legal preparedness can also be seen as the assemblage of procedural techniques and resources for the conservation and sustainable use of biodiversity. The procedural techniques constitute procedural law, which determines the fair, orderly, efficient and predictable application of the substantive law. Finally, the definition of legal preparedness may also follow the everyday use of the word “preparedness”, which connotes a state of being prepared to take action.

B. Why is legal preparedness for NBSAPs important for biodiversity conservation?

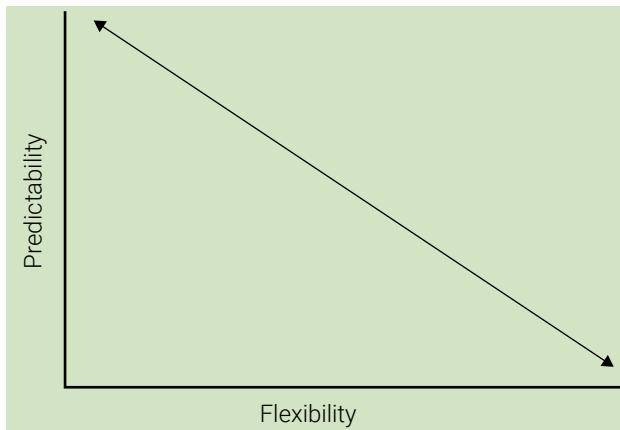
The role of the law in the development, implementation, monitoring, evaluation and revision of NBSAPs has long been established.¹³⁸ Scholars, legislators and policymakers have recognized the importance of law in the conservation and sustainable use of biodiversity.¹³⁹ That includes recognition that the conservation of biodiversity is key to the preservation of such human rights as the right to life, the right to health, the right to culture, the right to environmental information,

¹³⁸ International Development Law Organization (2016b).

¹³⁹ Snape, William J. (1996).

the right to participate in environmental decision-making and the right of access to justice in environmental matters.¹⁴⁰

It has been determined that biodiversity conservation is most successful when based on careful and systematic planning.¹⁴¹ In turn, good planning is dependent on a comprehensive framework of strategies, action plans and laws that define procedures, responsibilities and obligations; and create prioritization, flexibility and predictability.¹⁴²



Graph: adapted from Ben Brown's theory of predictability and flexibility¹⁴³

When placed along the diagonal line, legal preparedness ensures that the predicted biodiversity conservation goals and objectives are prioritized across all sectors and areas and are implemented, reviewed and achieved in a flexible manner, in line with existing constitutions, legislation, strategies and action plans. Particularly in the case of jurisdictions that

have many different ecosystems and species that need to be conserved, but have limited resources, focus should be on the most urgent priorities, for example species that are nearly extinct. Furthermore, legal preparedness inspires synergies across various sectors and that in turn facilitates implementation through the exchange of ideas and sharing of resources, thus leading to the attainment of NBSAP objectives, even when data and resources are limited.

NBSAPs are “living documents” that are intended to reflect realistic approaches to addressing biodiversity issues, and are usually updated and adapted as progress is made. They are part of a continuous improvement process that aims to make them better and more effective over time. In the revision process, legal preparedness helps to identify the gaps and widens the scope for improvement and refinement.

C. Design and applicability

Design of national biodiversity law refers to the tailoring of laws, procedures and systems in a manner that allows them to be easily and efficiently applied to any biodiversity conservation problem. The design of biodiversity law is crucial to overall national conservation efforts.

¹⁴⁰ Bosselmann, Klaus (2001). The expected report on biodiversity and human rights, by the United Nations Special Rapporteur on Human Rights and the Environment, is expected to greatly enhance discussions on human and biodiversity relations.

¹⁴¹ Boer, B.W. (2002).

¹⁴² Ibid.

¹⁴³ Ben Brown (2013), One Chart to Explain Everything: You're welcome. Available at <http://www.placemakers.com/2013/11/25/one-chart-to-explain-everything-youre-welcome/>.

| Design aspect | Applicability |
|--|--|
| Operation of different biodiversity conservation mechanisms | Legal preparedness determines how laws and institutions work and identifies their strengths and weaknesses and the principles that might guide conservation agents when choosing between legislation and institutions. |
| Incentives and structures for encouraging good early decisions | Legal preparedness ensures that laws and institutions apply and operate in resolving and preventing disputes; enable relevant stakeholders to take appropriate legal action; examine cases and judicial actions at different stages; and improve the understanding of system users, including what may deter them from taking action and what may incentivize them to take action. |
| Access to justice | Legal preparedness contributes to legal empowerment, establishes clear justice systems and dictates what happens to stakeholders who do not have access to the formal legal system or legal advice, including non-court mechanisms for dispute resolution and the role of non-legally qualified intermediaries. |
| Enforcement and outcomes | Legal preparedness determines whether decisions from courts, tribunals and other relevant mechanisms are implemented and ensures that they are; it also expands institutional options for improving enforcement and compliance. |

Conclusions

1. Legal preparedness for biodiversity is the state of having in place a substantive group of constitutional, legislative, regulatory, jurisprudential and sectoral or cross-sectoral rules and policies that together establish and enhance processes of biodiversity conservation and sustainable use. This level of preparedness refers to the existence of substantive law, which is the body of rules that determine the rights and obligations of biodiversity conservation bodies and sectors as well as rights over genetic resources.
2. Legal preparedness can also include procedural preparedness, which refers to the existence of procedural laws for determining the fair, orderly, efficient and predictable application of the substantive law.
3. Effective preparedness starts with the designing and tailoring of laws, procedures and systems in a manner that allows them to be easily and efficiently applied to any biodiversity conservation problem.
4. Legal preparedness begins with effective, essential and complimentary legal authorities, laws, policies and other subsets of laws enacted at the national, subnational and local levels to support national, subnational and local biodiversity governance and NBSAP implementation.



Strengthening and sustaining
legal preparedness in NBSAPs

*However, we must supply, supply, supply
we must supply, supply, supply*

V. Strengthening and sustaining legal preparedness in NBSAPs

Multilateral environmental agreements and practices continue to shape many areas of international biodiversity governance and management, while national legislation and policy continue to set the legal framework for local decision-making and implementation.¹⁴⁴ Although the agreements and the practice have achieved significant success, national reports continue to highlight the continued loss of biodiversity, which is, in part, the result of low levels of implementation and the ineffectiveness of existing international frameworks and national legislation.¹⁴⁵

Low implementation levels, fragmentation, lack of monitoring, weak compliance activities, weak enforcement and the general ineffectiveness of legislation have been identified as having political, administrative, socioeconomic and legal causes. Serious concerns are being raised about low capacity in the areas of financial, human and technical resources and planning. Governance institutions are generally weak. These challenges need to be fully addressed in all biodiversity-related discussions and forums. Legal frameworks need to evolve to accommodate changing realities and support scientific discoveries and to become more coherent and effective in addressing the pressing and emerging biodiversity challenges and issues at all levels.

This can be achieved by:

A. Expanding biodiversity conservation through legal preparedness

Biodiversity conservation and management occur at different levels and in different phases, namely local, national, subregional, regional and international. A variety of legislation applies to the different levels and phases, which justifies the need to address and engage various actors, diversify priorities, build support and identify and expand partnerships. Addressing and engaging various actors means identifying the diverse range of stakeholders affected directly or indirectly by biodiversity use and conservation decisions, and the specific legal framework that can best be employed to maximize their role in biodiversity conservation and management.

Countries continue to develop laws and policies aimed at ensuring the conservation and sustainable use of biodiversity, access thereto and the benefit-sharing therefrom, as well as the equitable use of traditional knowledge relating to biodiversity throughout the various levels. Countries have encountered substantive success under the Convention. However, many obstacles continue to hinder the full realization of the objectives of the Convention. This is primarily due to complexity in implementing the Convention and incorporating it into new or existing national legislation and policies.

¹⁴⁴ Wittmer, Heidi and Haripriya Gundimeda (eds.) (2012).

¹⁴⁵ Secretariat of the Convention on Biological Diversity (2014b).

At first glance, legal preparedness for NBSAPs may appear to be simply a matter of establishing and enshrining relevant biodiversity laws and policies in the relevant instruments. The laws and policies in terms of the legal preparedness for NBSAPs are of great significance, but they should not be the end point in efforts to attain maximum preparedness.

On closer examination, it becomes clear that legal preparedness for NBSAPs is as complex as the concept of biodiversity itself. Legal preparedness for NBSAPs extends beyond soft and hard laws to include having other basic elements in place, including institutional and professional competencies, accessible information on NBSAPs, enhanced laws and policies, coordination and integration mechanisms, ministerial and departmental levels, local levels, advisory bodies, courts and tribunals, and mechanisms for indigenous and local communities.

Biodiversity steering groups, stakeholder groups and working groups established at various biodiversity governance levels to address NBSAP planning, development, implementation, monitoring and evaluation are also a relevant limb of legal preparedness. The groups can include lawyers, public prosecutors, public defenders, auditors, ombudsmen and judges. Effective communication education and public awareness strategies on NBSAPs can also help to improve legal preparedness and effectiveness by informing people and other stakeholders about the substance of existing and new laws and measures. Public opinion forums involving major groups and stakeholders are also a useful mechanism through which needs of users in the private sector and civil society on the development of legal frameworks for NBSAPs can be accorded a role.

Legal preparedness also requires the enactment and adoption of clear implementation methods and accountability

frameworks that can be monitored, evaluated and reviewed by relevant participants and decision makers at all levels.

The present paper will now analyse the basic elements set out above, while seeking to establish the ways in which they can best be applied to enhance and sustain legal preparedness in the NBSAPs process.

B. Basic elements for strengthening and sustaining legal preparedness in the NBSAPs process

Institutional structures and professional competencies

With a view to addressing the problems of institutional fragmentation, the present paper approaches institutional and professional competencies as a single, combined issue. The fragmentation problems arose, inter alia, because of attempts to treat institutional competencies and professional competencies as separate and isolated issues.¹⁴⁶ The presumption here is that institutions are dependent on professionals and vice versa, hence the need for a streamlined, integrated approach. Differences may exist between the two concepts, but they may not be strong enough to override the problems caused by an isolated approach.

The terms “institution” and “professionals” signify overlapping portions of isolated, interrelated and interlocked activities and responsibilities. Institutions are made up of formal rules, laws and constitutions, as well as informal norms such as codes of conduct. In biodiversity conservation, the formal and informal rules are connected by enforcement mechanisms.

¹⁴⁶ Zelli, Fariborz, and Harro van Asselt (2013).

| Institutional levels | Competencies | Key issues for enhanced preparedness | Challenges | Way forward |
|-----------------------|--|---|---|--|
| Central government | National strategies, plans and programmes; regulations and legislation; coordination, information, data and technical advice; funding. | To facilitate intersectoral and intra-sectoral coordination and integration; capacity-building; knowledge and policy instruments; to monitor and manage change and challenges at the national level; to build consensus and capacity. | Constrained government agencies; fragmentation of institutions, laws and policies; limited skills and resources; fragmented data. | Acceptance that institutions outside central government have a clear role to play in enhancing central government strengths and weaknesses; developing successful partnerships for mainstreaming biodiversity; removing impediments; curing legal fragmentation; monitoring and review; accountability. Country experiences such as the National Commission for Knowledge and Use of Biodiversity (CONABIO) in Mexico, the National Biodiversity Commission (CONABIO in Brazil and the National Biodiversity Authority in India are some of the examples of central arms-length biodiversity institutions that have enhanced and contributed to independent science-based decision-making. |
| Local government | Local biodiversity use and planning; on-the-ground implementation. | Link local issues with national issues and priorities; use local strategies to develop and implement national strategies; build capacity; monitor and manage change and challenges at the local level; build consensus and capacity. | Local authorities are often tied to national funding; poor local-national coordination. | Appropriate balance between local and national objectives; collaboration with other bodies; efforts to gain local community support through knowledge-sharing; monitoring and review. In this regard, practices from local biodiversity strategies and action plans in countries like Japan and Korea, and the legal framework that sets these as legal requirements, and outcomes of the Fifth Global Biodiversity Summit of Cities and Subnational Governments held in Cancun, Mexico, from 9 to 11 December 2016 would be of use. |
| Regional coordinators | Assessment; identification, development and prioritization; intraregional implementation. | Reforms to ensure regional bodies have access to NBSAPs and other tools; build capacity; monitor and manage change and challenges at the regional level; build consensus and capacity. | Weak linkage with national, local and non-governmental levels of implementation. | Enhanced programme coordination; integrated implementation programmes; enhanced regional biodiversity strategies; monitoring and review. |

| Institutional levels | Competencies | Key issues for enhanced preparedness | Challenges | Way forward |
|--|---|---|--|---|
| Non-governmental organizations, including private sector and entrepreneurs | Networking and community support; voluntary participation, monitoring and review. | Innovation; communication; monitor and manage change and challenges at various levels; apply conflict resolution; build consensus and capacity. | Lack of recognition of non-governmental biodiversity concerns and efforts, including concerns raised by entrepreneurs and businesses | Incentives for voluntary conservation; individualization of NBSAPs; reduced suspicion of government involvement; monitoring and review. In that regard, a biodiversity offsetting programme in the United States of America that promotes coalitions of government, conservation agencies and private companies and backing by the United States Coastal Zone Management Act of 1972 would be a major point of reference. |

Institutions and professionals are key to the conservation and sustainable use of biodiversity. However, the legal framework within which they execute their mandate is a major determinant of how well they can fully contribute to the development, implementation and revision of NBSAPs.

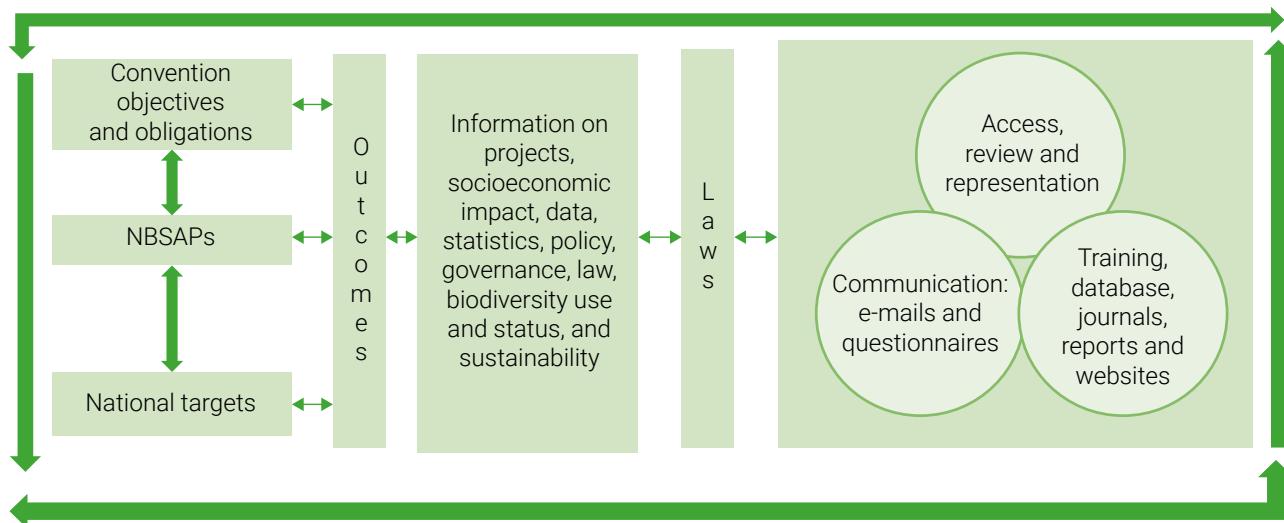
Conflicts and delays in biodiversity conservation occur because different institutions and individuals at different levels have different objectives. No matter how competent the institutions and professionals, it is not possible to attain conservation and sustainability at an individual or isolated level. Collaboration is crucial to avoid institutions and professionals, albeit unintentionally, working against each other. NBSAPs vary in nature and objectives and different institutions and stakeholders often need to integrate and reinforce each other.

The following table demonstrates that, for effective legal preparedness, it is necessary to involve every competent individual and institution at all levels, taking into consideration specific competencies and challenges.

C. Access to information and data on the NBSAPs process, related legislation, best practice and policies

While the existing NBSAPs are credited for comprehensively addressing and incorporating the most notable biodiversity issues, access to and sharing of information and data by relevant parties and stakeholders is not yet streamlined. The gaps between the available information and its relevance to addressing various challenges and contributing to the achievement of the set goals and objectives need to be filled in and then regularly updated.

The following table shows how access to basic information on NBSAPs, relevant legislations, practices, policies and stakeholders could help accelerate the realization of the set biodiversity objectives and conservation levels.



D. Coordination mechanisms across jurisdictions and sectors

Whereas many NBSAPs call for action at the national level, enhanced delivery on the objectives of the Convention and of other biodiversity-related conventions will require parties and stakeholders to collaborate much more closely in the implementation of the NBSAPs. In that regard, various multilateral environmental agreements and stakeholders have set and continue to set objectives through the adoption of synergistic approaches to implementation.¹⁴⁷ Results from areas as diverse as Brazil, Mexico, Romania and the European Union, among others, are already showing, encouragingly, that enhanced coordination and cooperation in the NBSAP process can provide launch pads for strengthening individual levels of legal preparedness.¹⁴⁸

¹⁴⁷ United Nations Environment Programme (2016b).

¹⁴⁸ Food and Agriculture Organization of the United Nations (2002); see also Food and Agriculture Organization of the United Nations (2003).

E. Ministerial and departmental levels

Ministries and relevant State departments play a crucial role in coordinating the development, revision and implementation of NBSAPs, as well as the overall conservation of biodiversity. The Hague Ministerial Declaration of the Conference of Parties to the Convention on Biological Diversity in 2002 underlined that critical role.¹⁴⁹

Various NBSAPs, such as those submitted by Australia and Germany, are prepared and implemented by ministries in coordination with relevant departments and stakeholders. Furthermore, the Australian Environment Protection and Biodiversity Conservation Act 1999 gives the minister a mandate to consider various factors and reports, and to consult with relevant departments before making any decision.¹⁵⁰

¹⁴⁹ The Hague Ministerial Declaration of the Conference of Parties to the Convention on Biological Diversity. Available at <https://www.cbd.int/doc/meetings/cop/cop-06/other/cop-06-min-decl-en.pdf>.

¹⁵⁰ Environment Protection and Biodiversity Conservation Act of Australia 1999 (see footnote 136).

As far as biodiversity issues are concerned, in general people want ministries and departments to be transparent and accountable. They expect that measures taken by ministers and other administrators will be effective, efficient and legally justifiable. A clear framework of policies, laws, strategies and instruments is essential for such purposes and should be taken into consideration throughout the NBSAP process.

(a) Local and municipal levels

The local and municipal levels serve as an effective support mechanism for implementing local, national and international decisions, given their proximity to biodiversity values, especially in countries with devolved political systems such as Kenya. Decisions X/2 and X/22 of the tenth meeting of the Conference of the Parties on the Strategic Plan for Biodiversity 2011–2020 and the Plan of Action on Subnational Governments, Cities and Other Local Authorities for Biodiversity (2011–2020) respectively call for local action in the implementation of the objectives of the Convention. Furthermore, subnational biodiversity strategies and action plans are increasingly being developed at the city, local, territorial, provincial and State levels.

In its decision IX/28, on promoting engagement of cities and local authorities, the Conference of the Parties at its ninth meeting recognized the role that cities and local authorities play in NBSAPs and invited parties, Governments and international development agencies to support and assist cities and local authorities in encouraging and promoting practices, activities and innovations of indigenous and local communities that support the three objectives of the Convention and achievement of the 2010 biodiversity target. That call was reiterated by the Conference of the Parties at its tenth meeting in decision X/22, on the involvement of subnational governments, cities and other local authorities

in the revision and implementation of NBSAPs. Further, in its decision XIII/1, the Conference of the Parties encouraged parties to facilitate the development by subnational governments, cities and other local authorities of subnational or local biodiversity strategies and action plans to contribute to the implementation of national biodiversity strategies and action plans and the Strategic Plan for Biodiversity 2011–2020.

Considering such significant guidance from the Conference of the Parties, local bodies could contribute in the following ways:

- (i) Develop and disseminate policy tools, guidelines and programmes that facilitate local action on biodiversity and build capacity to support national Governments in implementing the Convention, as well as the NBSAPs;
- (ii) Develop awareness-raising programmes on biodiversity for local stakeholders, including businesses, local administrators, non-governmental organizations, youth and indigenous and local communities, in line with relevant local social, political and economic strategies.
- (iii) Develop and implement subnational biodiversity strategies and action plans in line with and in support of NBSAPs.

(b) Advisory bodies

The role of advisory bodies is to keep under review the state of biodiversity and ecosystems and to advise institutions on appropriate measures that could be taken to combat pollution of all kinds and to protect and sustain biodiversity. That is the established practice in Brazil, Hong Kong, Madagascar and Mexico, for example, under the Advisory Council on the Environment.

Furthermore, given their diverse composition, advisory bodies are able to provide a forum for effective communication between members of the community, ministries and regulatory agencies. In addition to representing the various interests of the community and serving as focal points on biodiversity issues, members of advisory bodies are a valuable information resource for the community.

For enhanced legal preparedness, a broad range of stakeholders are involved in local policy decisions through advisory bodies, including governors, heads of institutions, researchers, planners and developers. Citizens, through their representatives, play their role effectively as advocates, conservationists or protestors. Regulating agencies are

held accountable in approving projects in compliance with existing legislation and actions, and dispute resolution mechanisms are enhanced.

(c) Courts and tribunals

Courts and tribunals have a significant role to play in enhancing legal preparedness for biodiversity conservation. Depending on the nature of the legal issues raised, courts and tribunals have differing levels of competence to assess and determine matters.

Those different levels of competence are analysed in the following table.

| Role of court or tribunal | Jurisdiction | Contribution to achieving biodiversity and NBSAPs objectives |
|----------------------------------|---|---|
| Dispute settlement | Jurisdiction to hear disputes, including those between parties and parties and individuals. | To hear and determine disputes related to the conservation and sustainable use of biodiversity, as well as those related to the sharing of benefits arising from its use in accordance with the Nagoya Protocol; to hear and determine disputes related to the development, revision and implementation of NBSAPs; to hear and decide on disputes concerning access to information. |
| Enforcement | Jurisdiction to declare a State non-compliant with the law. | To determine the legality of legislation, policies, activities and plans related to biological resources; to ensure respect for the rights of indigenous and local communities; and to ensure compliance with due process in administrative processes. |
| Administrative | Jurisdiction to review decisions of administrative actors to ensure procedural and regulatory respect for administrative authority. | To review conduct related to decision-making; to determine whether a decision has been made within the timeframe stipulated by the legislation; and to determine whether affected parties were given an opportunity to respond to all issues or factual allegations, without bias or conflict of interest. |
| Constitutional review | Jurisdiction to invalidate acts of legislative and executive bodies on the basis of a conflict with a higher order legal requirement. | To interpret, protect and enforce the Constitution; to determine the legality of actions based on the basic values of statehood, fundamental rights, the rule of law, justice and the separation of powers; to determine the constitutionality of legislation, action plans and policies. |



(d) Indigenous and local communities

The vital role of indigenous and local communities in contributing to effective protected area management and biodiversity conservation can no longer be disputed. Indigenous and local communities largely depend on biodiversity for their livelihoods. They also own, develop and disseminate traditional knowledge. There is broad acceptance and recognition of the contribution that traditional knowledge can make to the conservation and sustainable use of biodiversity.

In its decision XI/14, the Conference of the Parties to the Convention encouraged parties to take concrete actions to facilitate participation by indigenous and local communities in the development and implementation of NBSAPs. Further, in its decision XIII/1, the Conference of the Parties to the Convention requested the Executive Secretary, in preparing a follow-up to the Strategic Plan for Biodiversity 2011–2020, to inter alia take into consideration inputs from indigenous peoples and local communities. Parties are also encouraged to establish mechanisms to ensure the effective participation

of indigenous and local communities in decision-making and policy planning in the work of the Convention. Such participation can be achieved through studies of practices in community-based management of natural resources, taking into consideration the various indigenous and local practices that influence the development, implementation and amendment of various laws and policies. In turn, those laws and policies should contribute to the facilitation of consultations at those levels.

F. Accountability framework

An accountability framework is a statement establishing an obligation on institutions and their members to be answerable for all decisions made and actions taken, and a responsibility to honour their commitments to deliver on objectives, standards and plans. Accountability includes achieving objectives and goals, implementing and delivering on all mandates in accordance with all relevant rules, resolutions, legislation and objectives in a timely and cost-effective manner and reporting on progress and outcomes.

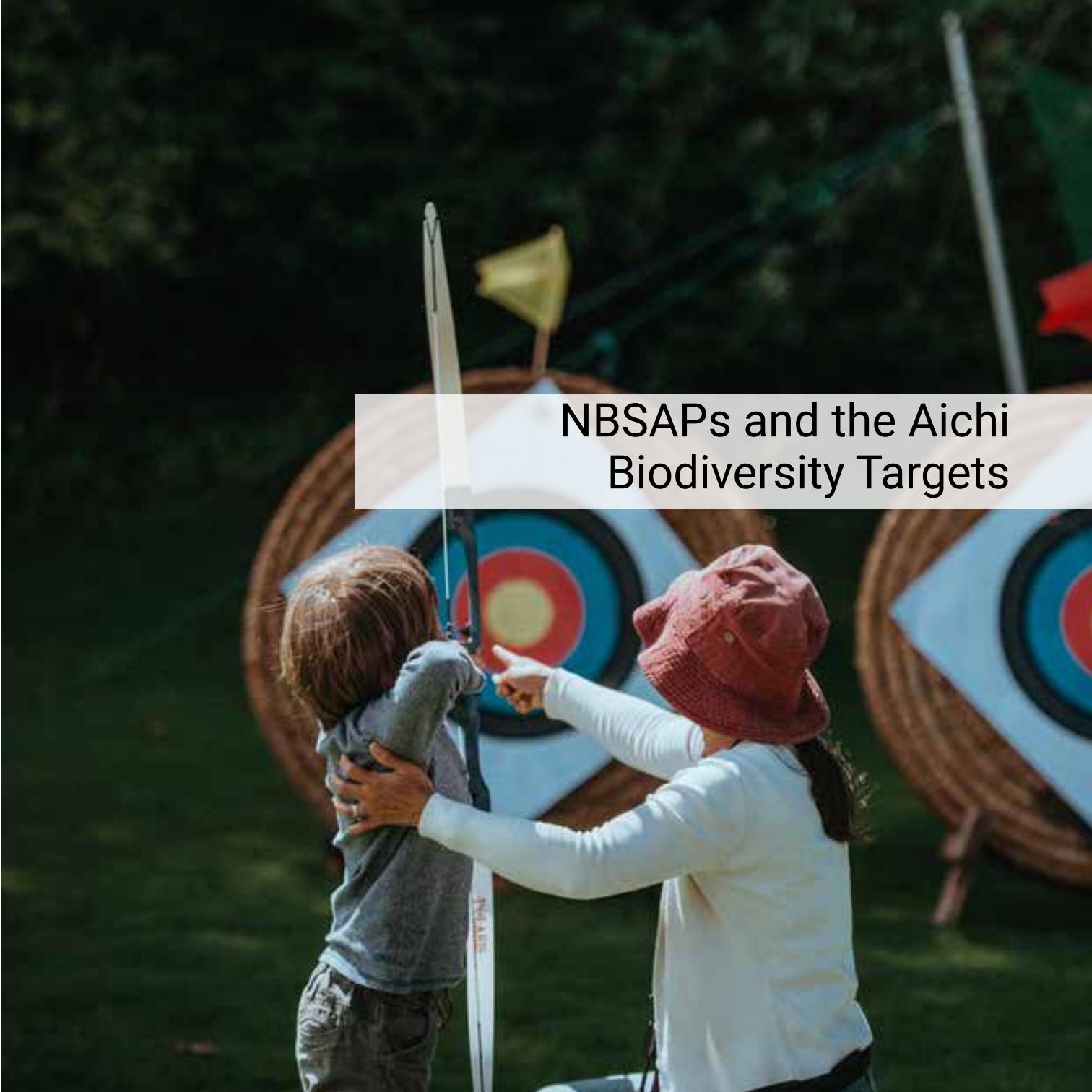
In the development, revision, implementation and monitoring of NBSAPs, it is crucial to ensure that the process is supported by a strong culture of transparency and accountability. Without a clear accountability framework, biodiversity planners lack the commitment necessary to adapt processes, realign strategies and reassign resources to meet expectations.

Accountability goes beyond internal control mechanisms. It encompasses issues such as identifying commitments to the international community, recourse to complaint and response mechanisms by key stakeholders and the transparency of various biodiversity stakeholders, including member States and local communities. The establishment of credible institutions such as tribunals and ombudsmen further enhances transparency and accountability.

An accountability framework in support of NBSAPs should guarantee participation, evaluation, transparency and feedback by stakeholders. Expectations should be predefined and clearly understood. NBSAP decisions should be made in a reasonable way with an acceptance of responsibility. The development, monitoring, implementation and revision of NBSAPs should be institutionalized.

Conclusions

Legal preparedness for NBSAPs is not only about establishing and enshrining relevant biodiversity laws and policies in the relevant instruments. It is about the aggregate efforts to attain maximum preparedness through institutional structures and professional competencies; public access to information and data on the NBSAPs process, related legislation, best practice and policies; enhanced coordination mechanisms across jurisdictions and sectors; cooperation at the ministerial, departmental, local and municipal levels; establishment of stronger advisory and research bodies, courts and tribunals; empowered lawyers, public prosecutors, public defenders, auditors, ombudsmen and judges; effective communication education and public awareness strategies; participatory procedures on the role of indigenous and local communities in the NBSAP process; and having in place clear accountability and transparency frameworks that can be monitored, evaluated and reviewed by relevant participants and decision makers at all levels.



NBSAPs and the Aichi Biodiversity Targets

VI. NBSAPs and the Aichi Biodiversity Targets

By its decision X/2, the Conference of the Parties to the Convention at its tenth meeting, held in Nagoya, Japan, from 18 to 29 October 2010, adopted a revised and updated Strategic Plan for Biodiversity, including the Aichi Biodiversity Targets for the period 2011–2020.¹⁵¹

The Strategic Plan for Biodiversity 2011–2020 is a ten-year framework for action by member States and stakeholders to save biodiversity and enhance its benefits. It establishes an overarching framework on biodiversity, not only for the biodiversity-related conventions, but for the entire United Nations system and all other partners engaged in biodiversity conservation, management and policy development.

At the tenth meeting of the Conference of the Parties to the Convention, the parties agreed to translate the Strategic Plan and the Aichi Biodiversity Targets into revised and updated NBSAPs.

By its decision X/10, the Conference of the Parties to the Convention decided that the fifth national reports, which were due to be submitted by 31 March 2014, should focus on the implementation of the Strategic Plan and progress made towards the implementation of the Aichi Biodiversity Targets.¹⁵² Furthermore, in decision XIII/1 on progress in the implementation of the Convention and the Strategic Plan for Biodiversity 2011–2020 and towards the achievement of the

Aichi Biodiversity Target 17

By 2015, each party has developed, adopted as a policy instrument, and has commenced implementing an effective, participatory and updated national biodiversity strategy and action plan.

Progress:

- ❖ Total of **190 of 196** (96 per cent) parties have developed NBSAPs in line with article 6 of the Convention
- ❖ Parties that have submitted NBSAPs since the tenth meeting of the Conference of the Parties: **154**
- ❖ Parties that have revised their post-2010 NBSAP taking into account the Strategic Plan for Biodiversity 2011–2020: **141**
- ❖ Parties whose post-2010 NBSAP does not take into account the Strategic Plan for Biodiversity 2011–2020: **13**
- ❖ Parties that have not yet submitted a post-2010 NBSAP: **36**
- ❖ Parties that have submitted their first NBSAPs and a revised version: **2**
- ❖ Parties that have submitted their first NBSAPs and more than one revised version: **2**

Source: *Convention on Biological Diversity website (accessed 13 March 2018).*

¹⁵¹ Henson, David W., and others (2016).

¹⁵² Convention on Biological Diversity, preamble.

Aichi Biodiversity Targets, the Conference of the Parties to the Convention recognized the need for a comprehensive and participatory process in the follow-up to the Strategic Plan for Biodiversity 2011–2020, and emphasized the need to focus current efforts on the implementation of the Strategic Plan for Biodiversity 2011–2020 and enhance efforts to achieve the Aichi Biodiversity Targets.

To implement the Strategic Plan, member States are required to review, update and revise their NBSAPs in line with the Strategic Plan; to develop national targets, using the Strategic Plan and the Aichi Biodiversity Targets; and to integrate those national targets into the updated NBSAPs.

National targets are developed taking into account national priorities and capacities, with a view to contributing to the collective efforts to attain the Aichi Biodiversity Targets. The updated NBSAPs can also be adopted as policy instruments for the integration of biodiversity into national development, accounting and planning processes for the Aichi Biodiversity Targets.

Legal preparedness for the Aichi Biodiversity Targets

The following table illustrates the links between the Aichi Biodiversity Targets and the legal approaches that would be considered, especially at the national level, to enhance the realization of those important goals.



Strategic goal A: Address the underlying causes of biodiversity loss by mainstreaming biodiversity across government and society



Target 1
By 2020, at the latest, people are aware of the values of biodiversity and the steps they can take to conserve and use it sustainably.

Related actions:

Legislation can be used to achieve the following:

- ❖ Establish and govern public and private authorities that collect and update environmental information, supported by legislation to regulate issues such as mandatory publication of information, time limits for completion of information requests, an administrative duty to assist the requester, costs for requests and copying, sanctions for failure to comply, reporting requirements and appeals procedures;
- ❖ Establish systems to ensure an adequate flow of information about proposed and existing activities that may significantly affect biodiversity;
- ❖ Develop public participation procedures and inspire legislation that can assert the need for a participatory democracy (as in the case of the South African Constitution);
- ❖ Include clauses on access to information in biodiversity law as overriding legislation;
- ❖ Eliminate conflict of laws, promote full implementation and reduce confusion among stakeholders (as is the case in the state of Sinaloa, Mexico);
- ❖ Formulate and establish codes for transparency (such as the Publication Scheme in the United Kingdom), supreme decrees and voluntary openness strategies (such as those seen in Argentina, Peru and the Plurinational State of Bolivia).



Target 2
By 2020, at the latest, biodiversity values have been integrated into national and local development and poverty reduction strategies and planning processes and are being incorporated into national accounting, as appropriate, and reporting systems.

1. Related actions at the national level

- ❖ Policy integration: NBSAPs should give due consideration to environmental, economic and social concerns as articulated in policies and legislation;
- ❖ Intergenerational timeframe: NBSAPs should adopt long-term timeframes that enable the inclusion of intergenerational principles and indicators;
- ❖ Analysis and assessments: legal mechanisms should be used as assessment tools in national reports to identify the environmental, economic and social costs and benefits of policy and strategy options;
- ❖ Coordination and institutions: legislation should allow a wide range of government departments and agencies to be involved in the formulation and implementation of NBSAPs;
- ❖ Local and regional governance: legislation should devise ways to involve local and regional authorities in the development and implementation of NBSAPs, with certain delivery aspects devolved to subnational levels;
- ❖ Indicators and targets: legislation should require that NBSAPs be based on structured indicator systems to assist in monitoring progress;
- ❖ Monitoring and evaluation: independent bodies or processes should be allowed to act as watchdogs, monitoring the implementation of NBSAPs and providing recommendations for their improvement, taking into consideration specific legal tools on, inter alia, Environmental Impact Assessment, Strategic Environmental Assessment, landscape approaches, ecosystem approaches, spatial planning.

2. Related actions at the local level

- ❖ Legislation should promote community-driven development, decentralized basic services, local economic development or a local governance approach;
- ❖ Legislation should help to build strong local institutions, including local government and local civil and private sectors, and should inform national policy development through lessons learned from those with experience of the reality on the ground.



Target 3

By 2020, at the latest, incentives, including subsidies, harmful to biodiversity are eliminated, phased out or reformed in order to minimize or avoid negative impacts, and positive incentives for the conservation and sustainable use of biodiversity are developed and applied, consistent and in harmony with the Convention and other relevant international obligations, taking into account national socioeconomic conditions.

Environmental incentives and disincentives

- ❖ Legislation can provide incentives or disincentives with regard to the environment, for example the use of economic instruments and market-based instruments;
- ❖ Incentives, especially economic instruments and market-based instruments, can be established through legislation and used for conservation of biodiversity (such as effluent taxes, charges on pollutants and waste, deposit-refund systems and tradable pollution permits);
- ❖ Legislation can inspire an economic instrument (for example, an environmental protection policy that encourages conservation and efficient production and consumption).



Target 4

By 2020, at the latest, Governments, business and stakeholders at all levels have taken steps to achieve or have implemented plans for sustainable production and consumption and have kept the impacts of use of natural resources well within safe ecological limits.

Potential of legislation and legal mechanisms

- ❖ Legislation and legal mechanisms can ensure the availability and sustainability of biodiversity through judicious use and systematic restoration or replacement;
- ❖ Legislation and legal mechanisms can increase the productivity of biodiversity in a manner consistent with environmental protection and enhancement;
- ❖ Legislation and legal mechanisms can govern the exploration, development, conservation, extraction, disposition, use and other commercial activities that tend to cause biodiversity depletion and degradation;
- ❖ Legislation and legal mechanisms can limit the percentage of timber (in terms of species) to be exported;
- ❖ Legislation and legal mechanisms can promulgate rules, regulations and guidelines on the assurance of co-production, joint ventures or production-sharing agreements, licences, permits, concessions, leases and other privileges and arrangements concerning the development, exploration and utilization of biodiversity;
- ❖ Legislation and legal mechanisms can also promulgate rules, regulations and guidelines that cancel any privileges or agreements in the case of failure, non-compliance with or violation of any regulations, orders or other causes that exist to further the conservation of biodiversity and support national interests. This could include laws that relate to consumer level behaviour and practices such as certifications, fair trade and green procurement. In addition, greater transparency and access to information can allow for better consumption practices. Use of technologies such REDD+ deforestation meters as well as corporate sustainability measures can be encouraged through legislation.

Strategic goal B: Reduce the direct pressures on biodiversity and promote sustainable use


Target 5

By 2020, the rate of loss of all natural habitats, including forests, is at least halved and where feasible brought close to zero, and degradation and fragmentation is significantly reduced.

Potential uses of legislation

- ❖ To develop appropriate institutional and governance arrangements that promote accountability;
- ❖ To align economic incentives to reduce the rate of biodiversity loss;
- ❖ To facilitate the empowerment of certain groups, including poor people, women and indigenous groups, who are particularly dependent on ecosystem services and disproportionately harmed by their degradation (for example, India's Scheduled Tribes and Other Forest Dwellers Act);
- ❖ To develop indicators that may be useful for tracking or monitoring the status of an ecosystem with defined thresholds and targets that would represent a desired level of health for the ecosystem, including planning laws, especially integrated or spatial planning;
- ❖ To develop restoration and maintenance programmes;
- ❖ To introduce a permit system for those who wish to engage in the commercialization of biodiversity, such as prospecting that involves indigenous biological resources or exporting any indigenous biological resources for bio-prospecting or research;
- ❖ To identify protected areas;
- ❖ To integrate coastal management and ecosystem-based fisheries management;
- ❖ To establish sanctions, fines and charges on those who encroach on forest reserves.


Target 6

By 2020 all fish and invertebrate stocks and aquatic plants are managed and harvested sustainably, legally and applying ecosystem-based approaches, so that overfishing is avoided, recovery plans and measures are in place for all depleted species, fisheries have no significant adverse impacts on threatened species and vulnerable ecosystems and the impacts of fisheries on stocks, species and ecosystems are within safe ecological limits.

Related actions

- ❖ The passing of legislation to provide an integrated process of information-gathering, analysis, planning, consultation, decision-making, resource allocation, formulation and implementation, creating enforcement rules or regulations to govern fisheries activities that will ensure continued productivity of the resources and the accomplishment of other fisheries objectives through the following means:
 - Formulating a non-binding code of conduct for responsible fisheries;
 - Introducing a straddling fish stocks system between neighbouring countries;
 - Announcing fishing seasons and developing a fishing season calendar;
 - Adopting annual fisheries control programmes;
 - Improving conservation measures, data collection methods and scientific advice concerning the sustainable management of fisheries resources;
 - Creating and maintaining balanced and inclusive institutions;
 - Agreeing on port state measures to prevent, deter and eliminate illegal, unreported and unregulated fishing;
 - Enforcing penalties for offences with international agreement and implementation;
 - Separating and sectioning freshwater fish farming.


Target 7

By 2020 areas under agriculture, aquaculture and forestry are managed sustainably, ensuring conservation of biodiversity.

Related legal actions

- ❖ Legislation can promote social agriculture with a view to contributing to the development of local communities, paying special attention to rural and less-favoured areas;
- ❖ Legislation on genetic technology can facilitate coordination between agricultural and environmental policy in order to avoid adverse effects from genetically modified organisms and to conserve the natural foundations of life, biodiversity, peasant agriculture and forestry, including pollution control in mountain areas and other disadvantaged areas, taking into account ecological compatibility and regional balance;
- ❖ Legislation can be used to regulate land-use planning.

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|  | <p>Target 8 By 2020, pollution, including from excess nutrients, has been brought to levels that are not detrimental to ecosystem function and biodiversity.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To regulate the fertilizer and animal foodstuffs industry, including the production, manufacture, packaging, importation and marketing of fertilizer and animal foodstuffs; ○ To regulate the importation of raw materials for the manufacture of animal foodstuffs; ○ To promote sustainable and environmentally sound practices for manufacturing fertilizer and animal foodstuffs; ○ To regulate the inspection and testing of fertilizer and animal foodstuffs to ensure their quality and safety; ○ To license manufacturers, distributors and retailers of fertilizer and animal foodstuffs; ○ To regulate the use of non-organic fertilizers, including conditions for classification, quality and mandatory labelling of mineral fertilizer, including their testing, phytosanitary control and sampling, transport issues, import and reception, as well as other issues that are important for the sustainable, correct, safe and secure use and management of mineral fertilizers. |
|  | <p>Target 9 By 2020, invasive alien species and pathways are identified and prioritized, priority species are controlled or eradicated, and measures are in place to manage pathways to prevent their introduction and establishment.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To control the import, stocking and spread of alien organisms that have, or may have, adverse effects on biodiversity; ○ To set permit conditions for the importation of organisms; ○ To regulate the release and sale of alien organisms; ○ To establish procedures for the control and eradication of invasive alien plant species; ○ To set out measures for the detection and eradication of alien species; ○ To ensure compliance with species management programmes; monitoring, control and eradication; definition of restricted activities; lists of alien or invasive species; registration of permits; risk assessment; and emergency interventions and additional control measures. |



Target 10

By 2015, the multiple anthropogenic pressures on coral reefs, and other vulnerable ecosystems impacted by climate change or ocean acidification are minimized, so as to maintain their integrity and functioning.

Related legislative action

- ❖ Legislation can be used to achieve the following:
 - To regulate or prohibit the use of bottom-trawl or similar towed nets operating in contact with the bottom of the sea in protected areas;
 - To govern the delineation of coral reef preserves;
 - To facilitate coastal zone management;
 - To create and expand a network of marine protected areas;
 - To control the impact of international trade on coral reef species;
 - To scale up management and governance systems to secure the future of functional groups and their roles in supporting the resilience of the coral reef;
 - To establish and control no-take areas, in which fishing and other human activities are prohibited as a tool for resilience management;
 - To regulate systems that support ownership and empowerment of users as stewards of reef resilience, provide incentives for herbivore protection before rather than after stocks collapse, and implement flexible restrictions, for example, to enhance the protection of critical species during their vulnerable periods;
 - To frame markets for reef resources by norms, rules and institutions, operating on scales from local to global, which secure coral reef resilience and thereby promote a greater diversity of options for economic development;
 - To mandate an interagency body to develop an ocean acidification research and monitoring plan and an ocean acidification programme;
 - To facilitate the development of national ocean policies.

Strategic goal C: Improve the status of biodiversity by safeguarding ecosystems, species and genetic diversity

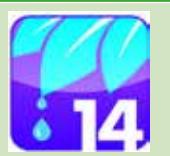


Target 11

By 2020, at least 17 per cent of terrestrial and inland water, and 10 per cent of coastal and marine areas, especially areas of particular importance for biodiversity and ecosystem services, are conserved through effectively and equitably managed, ecologically representative and well-connected systems of protected areas and other effective area-based conservation measures, and integrated into the wider landscapes and seascapes.

Related legislative action

- ❖ Legislation can be used to achieve the following:
 - To support and assist with the creation, maintenance and consolidation of conservation units of integral protection and sustainable use;
 - To establish mechanisms to ensure the financial support required to preserve protected areas and to promote the conservation of biodiversity, contributing to sustainable development in a decentralized and participatory manner;
 - To establish bodies to deliberate on strategic planning for protected areas;
 - To establish procedures, guidelines and criteria for the formalization of agreements and contracts;
 - To control the monitoring and evaluation of activities in protected areas;
 - To regulate hunting and logging;
 - To create administrative orders that provide specific guidelines and procedures for the survey, delineation and demarcation of the boundaries of all protected areas.

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|  | <p>Target 12 By 2020 the extinction of known threatened species has been prevented and their conservation status, particularly of those most in decline, has been improved and sustained.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To create incentives for private landowners to participate in land stewardship; ○ To regulate habitat conservation plans; ○ To provide the protection needed to prevent the extinction of endangered species; ○ To establish minimum protection standards and facilitate the provision of technical assistance to local units of government in identifying sensitive habitats, methods of protection and the review of local plans where the State has identified endangered species or their habitat to ensure compliance in the early stages of planning; ○ To facilitate the evaluation of the compatibility of various land uses with their surrounding natural systems, and the use of buffers to protect sensitive natural resources; ○ To balance public recreational opportunities with habitat protection efforts. |
|  | <p>Target 13 By 2020, the genetic diversity of cultivated plants and farmed and domesticated animals and of wild relatives, including other socio-economically as well as culturally valuable species, is maintained, and strategies have been developed and implemented for minimizing genetic erosion and safeguarding their genetic diversity.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To provide controls in introducing, trading, using and consuming living modified organisms and preserving the diversity of local genetic resources from risks deriving from the introduction and release of living modified organisms into the environment; ○ To establish regulatory frameworks for research and development in the field of genetic engineering, the employment of genetic engineering techniques and genetically modified organisms and their products to improve the quality and quantity of agricultural production in a safe and controlled manner; ○ To establish and govern bodies that develop plans and policies; ○ To enshrine bio-safety and import rules, inspection procedures and principles for risk analysis; ○ To regulate ethics in genetic engineering research, studies and reviews; ○ To ensure compliance with access and benefit-sharing for genetic resources and traditional knowledge associated with genetic resources in accordance with the provisions of the Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from their Utilization to the Convention on Biological Diversity. |
| Strategic goal D: Enhance the benefits to all from biodiversity and ecosystem services | | |
|  | <p>Target 14 By 2020, ecosystems that provide essential services, including services related to water, and contribute to health, livelihoods and well-being, are restored and safeguarded, taking into account the needs of women, indigenous and local communities, and the poor and vulnerable.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To promote access to services, including legal redress, and enable effective assertion of rights; ○ To provide a set of systems that facilitate the flow of relevant information and knowledge to the people; ○ To establish principles and guidelines on the special needs of women and other groups; ○ To establish effective remedies and compensatory procedures; ○ To establish policies to incorporate gender and other special perspectives into all policies, laws, procedures, programmes and practices relating to ecosystem services, and to identify gaps in the protection of persons and groups of concern. |

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|---|---|--|
|  | <p>Target 15 By 2020, ecosystem resilience and the contribution of biodiversity to carbon stocks has been enhanced, through conservation and restoration, including restoration of at least 15 per cent of degraded ecosystems, thereby contributing to climate change mitigation and adaptation and to combating desertification.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To impose a broad-based carbon tax on the purchase and use of fossil fuels, such as petrol, diesel, natural gas, heating fuel, propane gas and coal; ○ To establish financial incentives to reduce deforestation rates; ○ To restrain human activities that are a major cause of deforestation; ○ To formulate and implement programmes and measures to mitigate climate change; ○ To regulate the development, application and diffusion of climate-friendly technologies; ○ To formulate national policies and measures to limit greenhouse gas emissions and to protect and enhance sinks and reservoirs; ○ To shield special management zones and protect the special conservation value of the land; ○ To prohibit the taking of timber, forest products and forest materials and regulate the issuing of licences. |
|  | <p>Target 16 By 2015, the Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from their Utilization is in force and operational, consistent with national legislation.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To establish rules governing compliance with access and benefit-sharing for genetic resources and traditional knowledge associated with genetic resources in accordance with the provisions of the Nagoya Protocol; ○ To provide for assets, rights and obligations related to access to the genetic heritage of the country, including domesticated species and spontaneous population, on the continental platform, the territorial sea and the exclusive economic zone; ○ To develop specifications of a study on environmental impact assessments of the cost-effectiveness of national legislation on access to genetic resources and sharing of benefits arising from their use, including the regulation of access to genetic resources under national jurisdiction; ○ To establish the rights of communities over genetic resources and community knowledge in conformity with the Nagoya Protocol; ○ To protect the sovereign rights of the communities that have knowledge of biodiversity, and have managed, maintained, conserved, reproduced and enhanced biodiversity, genetic resources and traditional knowledge, culture and various forms of practice related to those resources; and to ensure that the communities benefit from the usage. |
| <p>Strategic goal E: Enhance implementation through participatory planning, knowledge management and capacity building</p> | | |
|  | <p>Target 17 By 2015 each party has developed, adopted as a policy instrument, and has commenced implementing an effective, participatory and updated national biodiversity strategy and action plan.</p> | <ul style="list-style-type: none"> ❖ All countries have achieved this target. As of March 2018, a total of 190 out of 196 parties (97 per cent) have developed and submitted NBSAPs.² Some of these are NBSAPs developed before the tenth meeting of the Conference of the Parties to the Convention but which were only approved and submitted after the tenth meeting of the Conference of the Parties to the Convention.³ By the December 2015 deadline on Aichi Biodiversity Target 17, a total of 69 Parties had submitted an NBSAP prepared, revised or updated after the adoption of the Strategic Plan for Biodiversity 2011–2020 and as of 14 March 2018, 85 additional countries had submitted a revised or updated NBSAP, bringing the total of NBSAPs since the tenth meeting of the Conference of the Parties to 154. |

| | | |
|--|--|--|
|  | <p>Target 18 By 2020, the traditional knowledge, innovations and practices of indigenous and local communities relevant for the conservation and sustainable use of biodiversity, and their customary use of biological resources, are respected, subject to national legislation and relevant international obligations, and fully integrated and reflected in the implementation of the Convention with the full and effective participation of indigenous and local communities, at all relevant levels.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To establish competencies, duties and responsibilities of a body mandated to enable participation in discussions, proposals and design and to assist in the implementation and control of public policies related to the sustainable development of indigenous people and traditional communities who are self-defining or self-attributing, as is the case under the Indigenous and Tribal Peoples Convention, 1989 (No. 169) of the International Labour Organization; ○ To facilitate implementation of State policy on the protection of indigenous people and traditional communities and any activities related to the fields of health, education, culture, water, sanitation, agriculture and technical capacity-building, and to govern legal and administrative proceedings related to the rights of indigenous people; ○ To provide for areas of traditional management by small indigenous ethnic communities and to consider protected areas destined for traditional management, ensuring the traditional and customary rights of small indigenous ethnic communities; ○ To establish under regional law the legal basis for the protection of natural habitats and the traditional way of life of regional small indigenous ethnic communities and, in particular, traditional commercial hunting rights, community wildlife management and commercial inland fisheries. |
|  | <p>Target 19 By 2020, knowledge, the science base and technologies relating to biodiversity, its values, functioning, status and trends, and the consequences of its loss, are improved, widely shared and transferred, and applied.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To establish national bodies for science, technology and innovation to regulate and assure quality in the science, technology and innovation sector; research bodies and agencies; and research funds (such as the Kenya Agricultural and Livestock Research Organization, which was created under the Kenya Agricultural and Livestock Research Act 2013); ○ To ensure that anyone wishing to undertake scientific research is required to obtain a licence and that the licensee shall comply with the prescribed procedures, standards and codes of ethics; ○ To regulate the registration of research institutes. |
|  | <p>Target 20 By 2020, at the latest, the mobilization of financial resources for effectively implementing the Strategic Plan for Biodiversity 2011–2020 from all sources, and in accordance with the consolidated and agreed process in the Strategy for Resource Mobilization, should increase substantially from the current levels. This target will be subject to changes contingent to resource needs assessments to be developed and reported by Parties.</p> | <p>Related legislative action</p> <ul style="list-style-type: none"> ❖ Legislation can be used to achieve the following: <ul style="list-style-type: none"> ○ To strengthen constitutional provisions on biodiversity and resource mobilization; ○ To establish policies, regulations and mechanisms for transparency and accountability in resource mobilization and reporting. |

Conclusions

Legislative action has contributed and is contributing to the concretization of action for the implementation and achievement of all Aichi Biodiversity Targets. It is also clear that legal approaches and instruments can help policymakers and other biodiversity stakeholders examine the effectiveness of their national biodiversity processes with the aim of developing legal knowledge and practical actions for integrating and mainstreaming biodiversity into other policy areas.

A hand is holding a pair of brown-rimmed glasses. The lens of the glasses shows a clear view of a lush green forest with many trees and tall grass. The background behind the glasses is a solid, muted green color.

Review of legal considerations
within NBSAPs

VII. Review of legal considerations within NBSAPs

The Convention on Biological Diversity establishes obligations for member States through its article 6, on general measures for conservation and sustainable use. Part (a) of that article states that each party should develop, in accordance with its particular conditions and capabilities, national strategies, plans or programmes for the conservation and sustainable use of biological diversity or adapt for this purpose existing strategies, plans or programmes which shall reflect, inter alia, the measures set out in this Convention relevant to the party concerned in order to promote the conservation and sustainable use of biodiversity.

The present section focuses on the extent to which parties created national strategies, analysed their legal framework and developed new legal measures. To undertake the review, the following research questions were posed:

1. To what extent did parties respond to their obligations under the Convention to:
 - (i) Prepare national biodiversity strategies (article 6 (a) and decisions IX/8 and X/2 of the Convention on Biological Diversity);
 - (ii) Prepare NBSAPs following the adoption of the Strategic Plan for Biodiversity 2011–2020 (decision X/2);
 - (iii) Have up-to-date NBSAPs (decision IX/8).
2. Have parties reviewed their laws related to biodiversity after 2010 to ensure the implementation of the Strategic Plan for Biodiversity 2011–2020 (decision X/2)?

3. To what extent have parties developed new legal measures after the tenth meeting of the Conference of the Parties, held in 2010?

Methodology

The data and information used to answer the research questions were gathered from the NBSAPs that were available on the clearing-house mechanism of the Convention on Biological Diversity by 28 February 2018.¹⁵³

1. To respond to question 1, a quantitative analysis was carried out of the following:
 - (i) The name and number of parties that had submitted NBSAPs that were published on the clearing-house mechanism of the Convention on Biological Diversity;
 - (ii) The number and name of parties with NBSAPs submitted/revised after the adoption of the Strategic Plan for Biodiversity 2011–2020;
 - (iii) The name and number of parties with NBSAPs with a start date after 2010.
2. To respond to question 2, the NBSAPs were reviewed to determine the extent to which parties had reviewed their laws related to biodiversity. In addition, the name and number of parties that had performed a legal analysis of their biodiversity legislative framework

¹⁵³ By decision IX/8, parties were required to make their national biodiversity strategies and action plans available through the clearing-house mechanism of the Convention (www.cbd.int).

in general and post-2010 were collected. For the purpose of this review, the term “legal analysis” may include a description of the legislative framework, legal measures or indications on legal actions to be achieved by the end of any given timeline.

3. To respond to question 3, the number of NBSAPs, including specific legal measures, were calculated. For the purpose of this review, legal measures are distinguished from policy measures in that legal measures require direct changes to legislation or to the regulatory framework or are aimed at a review and/ or revision of the legislative framework.

Research limitations

A small number of NBSAPs were not reviewed owing to language barriers. Gaps are indicated in the graphics below with the heading “missing information”.

The cut-off point for reviewed NBSAPs was 28 February 2018. The review thus does not include NBSAP updates and submissions made past that date.

All NBSAPs prepared after 2010 are considered up-to-date although circumstances may have changed for some parties since submission.

Data review and findings

The following sections present the results of the research undertaken to answer the three research questions.

Extent to which parties have developed NBSAPs

As of 28 February 2018, 6 parties to the Convention on Biological Diversity had never submitted NBSAPs; thus 190 parties have fulfilled the requirement of the Convention on Biological Diversity to prepare an NBSAP. Of the 190 parties, 154 submitted their NBSAP after the tenth meeting of the Conference of the Parties and the adoption of the Strategic Plan for Biodiversity 2011–2020, including the Aichi Biodiversity Targets. Of the 154, only 150 NBSAPs have a start date after the adoption of the Strategic Plan for Biodiversity. The other four NBSAPs were developed before the tenth meeting of the Conference of the Parties but were only approved and submitted after that meeting.

Where a country has set out different legal measures and objectives in its NBSAP, each measure was treated as a separate legal measure.

Antigua and Barbuda:

- (i) Establish the necessary policy and legal framework to facilitate the management, sustainable use and protection of the country's biodiversity; review, update and enact legislation to support the protection of the environment.
- (ii) Develop the legal and institutional framework necessary to ensure the safety of biotechnology as well as to ensure that maximum benefits accrue to Antigua and Barbuda from the exploitation of its biological resources.
- (iii) Enact legislation for endangered species; provide legal protection for Great Bird island; improve beach protection; and establish regulations for biodiversity use, regulations for activities in sensitive areas and training for those involved in legislative aspects of the management framework.
- (iv) Review the draft forestry and wild life act (1988), pesticide and toxic chemicals act; enact legislation for endangered species; provide legal protection for Great Bird island; improve beach protection; and establish regulations for biodiversity use, regulations for activities in sensitive areas and training for those involved in legislative aspects of the management framework.

List of parties with an NBSAP, including duration

Missing information: NBSAP duration dates for Latvia, Syrian Arab Republic and Tajikistan.

| | | | | | |
|-------------------------------------|-----------|--|-----------|-------------------------------------|-----------|
| Afghanistan | 2014–2017 | Chad | 2014–2020 | Germany | 2014–2020 |
| Albania | 2015–2020 | Chile | 2003 | Ghana | 2016–2020 |
| Algeria | 2016–2030 | China | 2011–2030 | Greece | 2014–2020 |
| Andorra | 2016–2024 | Colombia | 2016–2030 | Grenada | 2016–2020 |
| Angola | 2007–2012 | Comoros | 2011–2030 | Guatemala | 2012–2022 |
| Antigua and Barbuda | 2014–2020 | Congo | 2015–2020 | Guinea | 2011–2022 |
| Argentina | 2016–2020 | Cook Islands | 2002 | Guinea–Bissau | 2015–2020 |
| Armenia | 2016–2020 | Costa Rica | 2016–2025 | Guyana | 2012–2020 |
| Australia | 2010–2030 | Côte d'Ivoire | 2016–2020 | Haiti | 2002 |
| Austria | 2015–2020 | Croatia | 2017–2025 | Honduras | 2004 |
| Azerbaijan | 2017–2020 | Cuba | 2016–2020 | Hungary | 2015–2020 |
| Bahamas | 1999 | Czechia | 2016–2025 | India | 2014–2020 |
| Bahrain | 2016–2021 | Democratic People's Republic of Korea | 2007 | Indonesia | 2015–2020 |
| Bangladesh | 2016–2021 | Democratic Republic of the Congo | 2016–2020 | Iran (Islamic Republic of) | 2016–2030 |
| Barbados | 2002 | Denmark | 2014–2020 | Iraq | 2015–2020 |
| Belarus | 2011–2020 | Djibouti | 2017–2020 | Ireland | 2017–2021 |
| Belgium | 2014–2020 | Dominica | 2014–2020 | Israel | 2010 |
| Belize | 2016–2022 | Dominican Republic | 2011–2020 | Italy | 2010–2020 |
| Benin | 2011–2020 | Ecuador | 2015–2030 | Jamaica | 2016–2021 |
| Bhutan | 2014–2020 | Egypt | 2015–2030 | Japan | 2012–2020 |
| Bolivia (Plurinational State of) | 2006 | El Salvador | 2013–2020 | Jordan | 2015–2020 |
| Bosnia and Herzegovina | 2015–2020 | Equatorial Guinea | 2011–2020 | Kazakhstan | 1999 |
| Botswana | 2016–2025 | Eritrea | 2014–2020 | Kenya | 2000 |
| Brazil | 2011–2020 | Estonia | 2012–2020 | Kiribati | 2016–2020 |
| Brunei Darussalam | 2015–2020 | Ethiopia | 2015–2020 | Kuwait | 1999–2010 |
| Bulgaria | 2005 | European Union | 2011–2020 | Kyrgyzstan | 2011–2024 |
| Burkina Faso | 2011–2015 | Fiji | 2006 | Lao People's Democratic Republic | 2016–2025 |
| Burundi | 2013–2020 | Finland | 2013–2020 | Latvia | |
| Cabo Verde | 2014–2030 | France | 2011–2020 | Lebanon | 2016–2030 |
| Cambodia | 2016–2020 | Gabon | 2004 | Lesotho | 2000 |
| Cameroon | 2012–2020 | Gambia | 2015–2020 | Liberia | 2017–2025 |
| Canada | 2011–2020 | Georgia | 2014–2020 | Liechtenstein | 2014–2020 |
| Central African Republic | 2000 | | | Lithuania | 2015–2020 |

| | | | | | |
|-------------------------------------|-----------|-------------------------------------|-----------|---|-----------|
| Luxembourg | 2017–2021 | Poland | 2015–2020 | Republic of Macedonia | 2004 |
| Madagascar | 2015–2025 | Portugal | 2001 | Timor-Leste | 2011–2020 |
| Malawi | 2015–2025 | Qatar | 2015–2025 | Togo | 2011–2020 |
| Malaysia | 2016–2025 | Republic of Korea | 2014–2018 | Tonga | 2006 |
| Maldives | 2016–2025 | Republic of Moldova | 2015–2020 | Trinidad and Tobago | 1996 |
| Mali | 2014–2020 | Romania | 2014–2020 | Tunisia | 2018–2030 |
| Malta | 2012–2020 | Russian Federation | 2014–2020 | Turkey | 2007 |
| Marshall Islands | 2002 | Rwanda | 2016–2020 | Turkmenistan | 2002 |
| Mauritania | 2011–2020 | Saint Kitts and Nevis | 2014–2020 | Tuvalu | 2012–2016 |
| Mauritius | 2017–2025 | Saint Lucia | 2002 | Uganda | 2015–2025 |
| Mexico | 2016–2030 | Saint Vincent and the Grenadines | 2000 | Ukraine | 2010–2020 |
| Micronesia (Federated States of) | 2002 | Samoa | 2015–2020 | United Arab Emirates | 2014–2021 |
| Mongolia | 2015–2025 | San Marino | 2018–2025 | United Kingdom of Great Britain and Northern Ireland | 2011–2020 |
| Montenegro | 2016–2020 | Sao Tome and Principe | 2015–2020 | United Republic of Tanzania | 2015–2020 |
| Morocco | 2016–2020 | Saudi Arabia | 2005 | Uruguay | 2016–2020 |
| Mozambique | 2015–2020 | Senegal | 2015–2030 | Uzbekistan | 2015–2025 |
| Myanmar | 2015–2020 | Serbia | 2012–2018 | Vanuatu | 1999 |
| Namibia | 2013–2020 | Seychelles | 2015–2020 | Venezuela (Bolivarian Republic of) | 2010–2020 |
| Nauru | 2010–2020 | Sierra Leone | 2017–2026 | Viet Nam | 2012–2030 |
| Nepal | 2014–2020 | Singapore | 2009 | Yemen | 2011–2025 |
| Netherlands | 2014–2020 | Slovakia | 2014–2020 | Zambia | 2015–2025 |
| | | Slovenia | 2002 | Zimbabwe | 2014–2020 |
| New Zealand | 2016–2020 | Solomon Islands | 2016–2020 | | |
| Nicaragua | 2015–2020 | Somalia | 2015–2030 | | |
| Niger | 2014–2020 | South Africa | 2015–2025 | | |
| Nigeria | 2016–2020 | Spain | 2011–2017 | | |
| Niue | 2015–2020 | Sri Lanka | 2016–2022 | | |
| Norway | 2016–2020 | Sudan | 2015–2020 | | |
| Oman | 2001 | Suriname | 2012–2016 | | |
| Pakistan | 1999 | Swaziland | 2016–2020 | | |
| Palau | 2004 | Sweden | 2012–2020 | | |
| Panama | 2000 | Switzerland | 2012–2020 | | |
| Papua New Guinea | 2007 | Syrian Arab Republic | | | |
| Paraguay | 2015–2020 | Tajikistan | | | |
| Peru | 2014–2021 | Thailand | 2010–2021 | | |
| Philippines | 2015–2028 | the former Yugoslav | | | |

Each country of the United Kingdom of Great Britain and Northern Ireland (England, Northern Ireland, Scotland and Wales) has its own NBSAP, some with differing start dates. However, 2011 is recorded on the website of the Convention on Biological Diversity as the NBSAP start date for that party to the Convention.

End dates for NBSAPs with start dates pre-2010 have not been included given that post-2010 NBSAPs are the focus and future of the implementation of the Convention on Biological Diversity.

Parties with a post-2010/up-to-date NBSAP

A total of 150 out of 190 parties have NBSAPs with a start date after the adoption of the Strategic Plan for Biodiversity 2011–2020 at the tenth meeting of the Conference of the Parties in 2010.

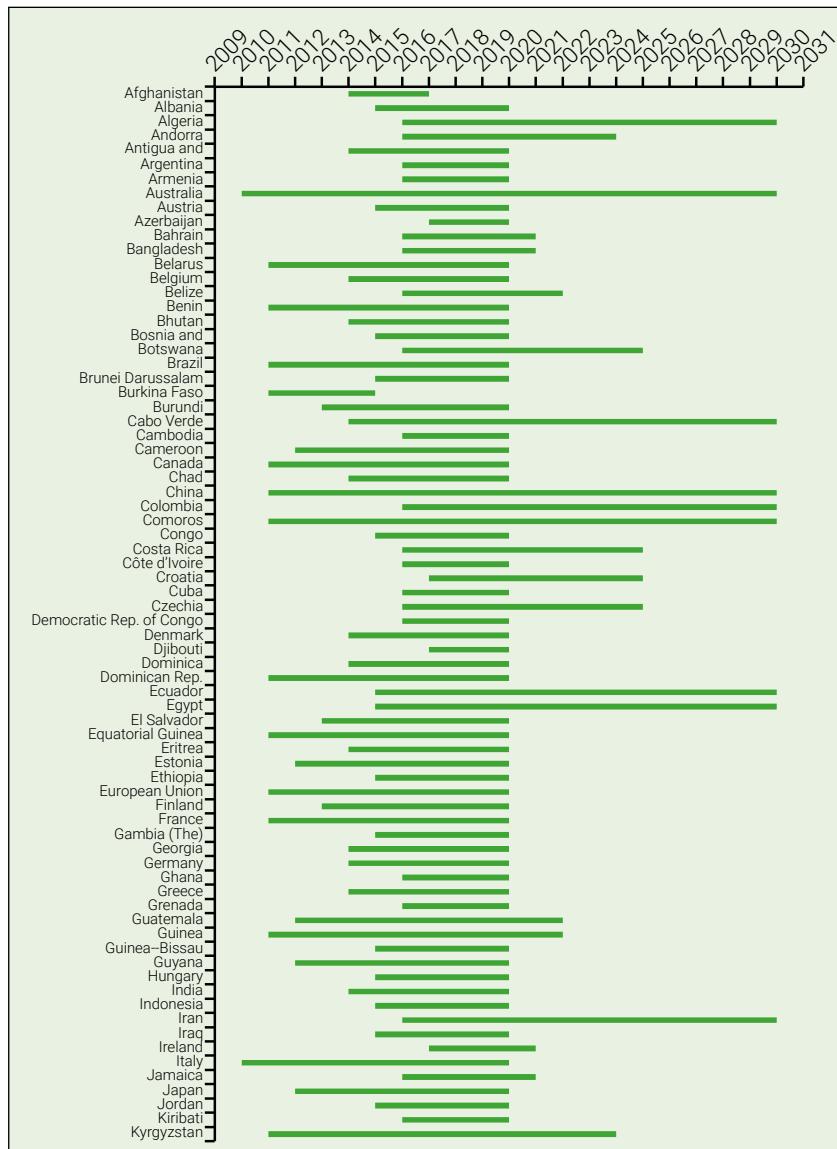
Duration of the 150 NBSAPs

The following chart displays the duration of NBSAPs of 150 parties with post-2010 NBSAPs.

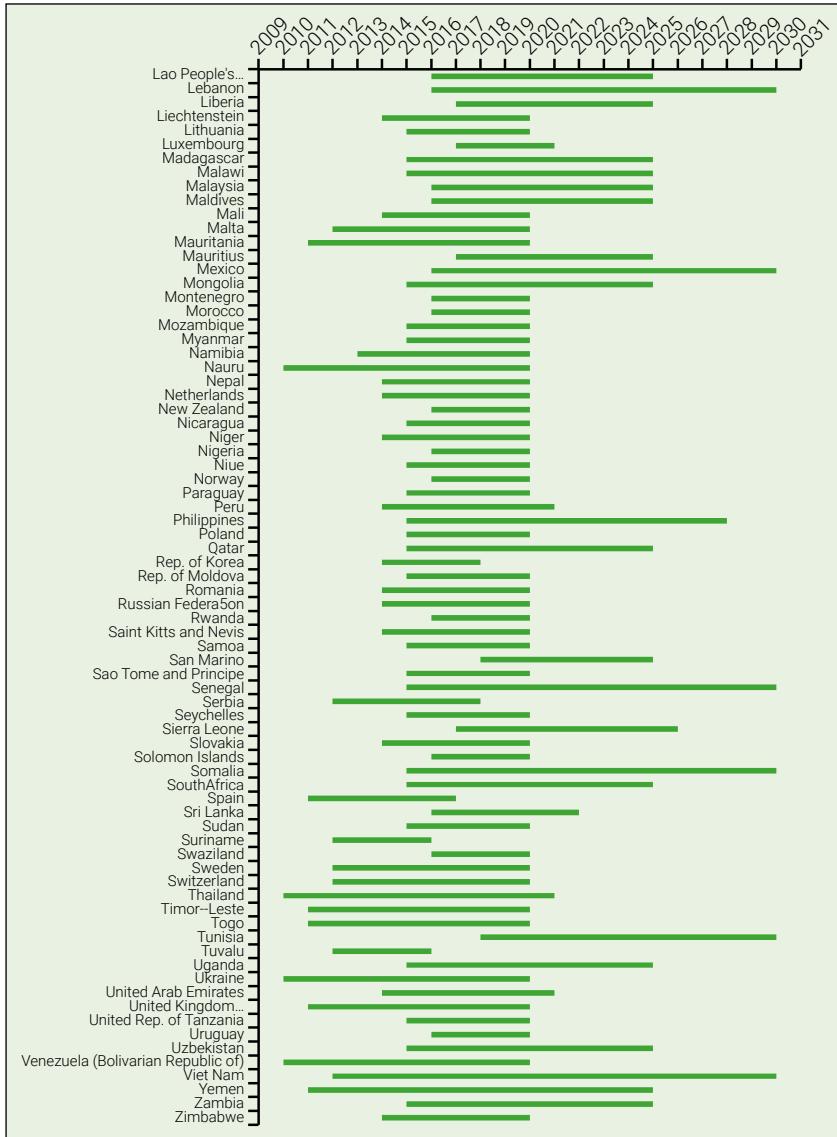
Missing information: Latvia, Syrian Arab Republic and Tajikistan



Post-2010 (up-to-date) NBSAPs



List of the 150 parties whose data are featured in the previous chart, along with their NBSAP duration:



| | | | | | |
|------------------------|-----------|----------------------------|-----------|---------------------|-----------|
| Afghanistan | 2014–2017 | Czechia | 2016–2025 | Jordan | 2015–2020 |
| Albania | 2015–2020 | Democratic Republic | | Kiribati | 2016–2020 |
| Algeria | 2016–2030 | of the Congo | 2016–2020 | Kyrgyzstan | 2011–2024 |
| Andorra | 2016–2024 | Denmark | 2014–2020 | Lao People's | |
| Antigua and Barbuda | 2014–2020 | Djibouti | 2017–2020 | Democratic Republic | 2016–2025 |
| Argentina | 2016–2020 | Dominica | 2014–2020 | Lebanon | 2016–2030 |
| Armenia | 2016–2020 | Dominican Republic | 2011–2020 | Liberia | 2017–2025 |
| Australia | 2010–2030 | Ecuador | 2015–2030 | Liechtenstein | 2014–2020 |
| Austria | 2015–2020 | Egypt | 2015–2030 | Lithuania | 2015–2020 |
| Azerbaijan | 2017–2020 | El Salvador | 2013–2020 | Luxembourg | 2017–2021 |
| Bahrain | 2016–2020 | Equatorial Guinea | 2011–2020 | Madagascar | 2015–2025 |
| Bangladesh | 2016–2021 | Eritrea | 2014–2020 | Malawi | 2015–2025 |
| Belarus | 2011–2020 | Estonia | 2012–2020 | Malaysia | 2016–2025 |
| Belgium | 2014–2020 | Ethiopia | 2015–2020 | Maldives | 2016–2025 |
| Belize | 2016–2022 | European Union | 2011–2020 | Mali | 2014–2020 |
| Benin | 2011–2020 | Finland | 2013–2020 | Malta | 2012–2020 |
| Bhutan | 2014–2020 | France | 2011–2020 | Mauritania | 2011–2020 |
| Bosnia and Herzegovina | 2015–2020 | Gambia | 2015–2020 | Mauritius | 2017–2025 |
| Botswana | 2016–2025 | Georgia | 2014–2020 | Mexico | 2016–2030 |
| Brazil | 2011–2020 | Germany | 2014–2020 | Mongolia | 2015–2025 |
| Brunei Darussalam | 2015–2020 | Ghana | 2016–2020 | Montenegro | 2016–2020 |
| Burkina Faso | 2011–2015 | Greece | 2014–2020 | Morocco | 2016–2020 |
| Burundi | 2013–2020 | Grenada | | Mozambique | 2015–2020 |
| Cabo Verde | 2014–2030 | 2016–2020 | | Myanmar | 2015–2020 |
| Cambodia | 2016–2020 | Guatemala | 2012–2022 | Namibia | 2013–2020 |
| Cameroon | 2012–2020 | Guinea | 2011–2022 | Nauru | 2010–2020 |
| Canada | 2011–2020 | Guinea-Bissau | 2015–2020 | Nepal | 2014–2020 |
| Chad | 2014–2020 | Guyana | 2012–2020 | Netherlands | 2014–2020 |
| China | 2011–2030 | Hungary | 2015–2020 | New Zealand | 2016–2020 |
| Colombia | 2016–2030 | India | 2014–2020 | Nicaragua | 2015–2020 |
| Comoros | 2011–2030 | Indonesia | 2015–2020 | Niger | 2014–2020 |
| Congo | 2015–2020 | Iran (Islamic Republic of) | 2016–2030 | Nigeria | 2016–2020 |
| Costa Rica | 2016–2025 | Iraq | 2015–2020 | Niue | 2015–2020 |
| Côte d'Ivoire | 2016–2020 | Ireland | 2017–2021 | Norway | 2016–2020 |
| Croatia | 2017–2025 | Italy | 2010–2020 | Paraguay | 2015–2020 |
| Cuba | 2016–2020 | Jamaica | 2016–2021 | Peru | 2014–2021 |
| | | Japan | 2012–2020 | Philippines | 2015–2028 |

| | | | |
|--|-----------|-----------------------------|------------|
| Poland | 2015–2020 | United Republic of Tanzania | 2015– 2020 |
| Qatar | 2015–2025 | Uruguay | 2016–2020 |
| Republic of Korea | 2014–2018 | Uzbekistan | 2015–2025 |
| Republic of Moldova | 2015–2020 | Venezuela | |
| Romania | 2014–2020 | (Bolivarian Republic of) | 2010–2020 |
| Russian Federation | 2014–2020 | Viet Nam | 2012–2030 |
| Rwanda | 2016–2020 | Yemen | 2011–2025 |
| Saint Kitts and Nevis | 2014–2020 | Zambia | 2015–2025 |
| Samoa | 2015–2020 | Zimbabwe | 2014–2020 |
| San Marino | 2018–2025 | | |
| Sao Tome and Principe | 2015–2020 | | |
| Senegal | 2015–2030 | | |
| Serbia | 2012–2018 | | |
| Seychelles | 2015–2020 | | |
| Sierra Leone | 2017–2026 | | |
| Slovakia | 2014–2020 | | |
| Solomon Islands | 2016–2020 | | |
| Somalia | 2015–2030 | | |
| South Africa | 2015–2025 | | |
| Spain | 2011–2017 | | |
| Sri Lanka | 2016–2022 | | |
| Sudan | 2015–2020 | | |
| Suriname | 2012–2016 | | |
| Swaziland | 2016–2020 | | |
| Sweden | 2012–2020 | | |
| Switzerland | 2012–2020 | | |
| Thailand | 2010–2021 | | |
| Timor-Leste | 2011–2020 | | |
| Togo | 2011–2020 | | |
| Tunisia | 2018–2030 | | |
| Tuvalu | 2012–2016 | | |
| Uganda | 2015–2025 | | |
| Ukraine | 2010–2020 | | |
| United Arab Emirates | 2014–2021 | | |
| United Kingdom of Great Britain and Northern Ireland | 2011–2020 | | |

The median and mode start and end dates are 2015 and 2020 respectively.

The median and mode NBSAP durations are six years and five years respectively.

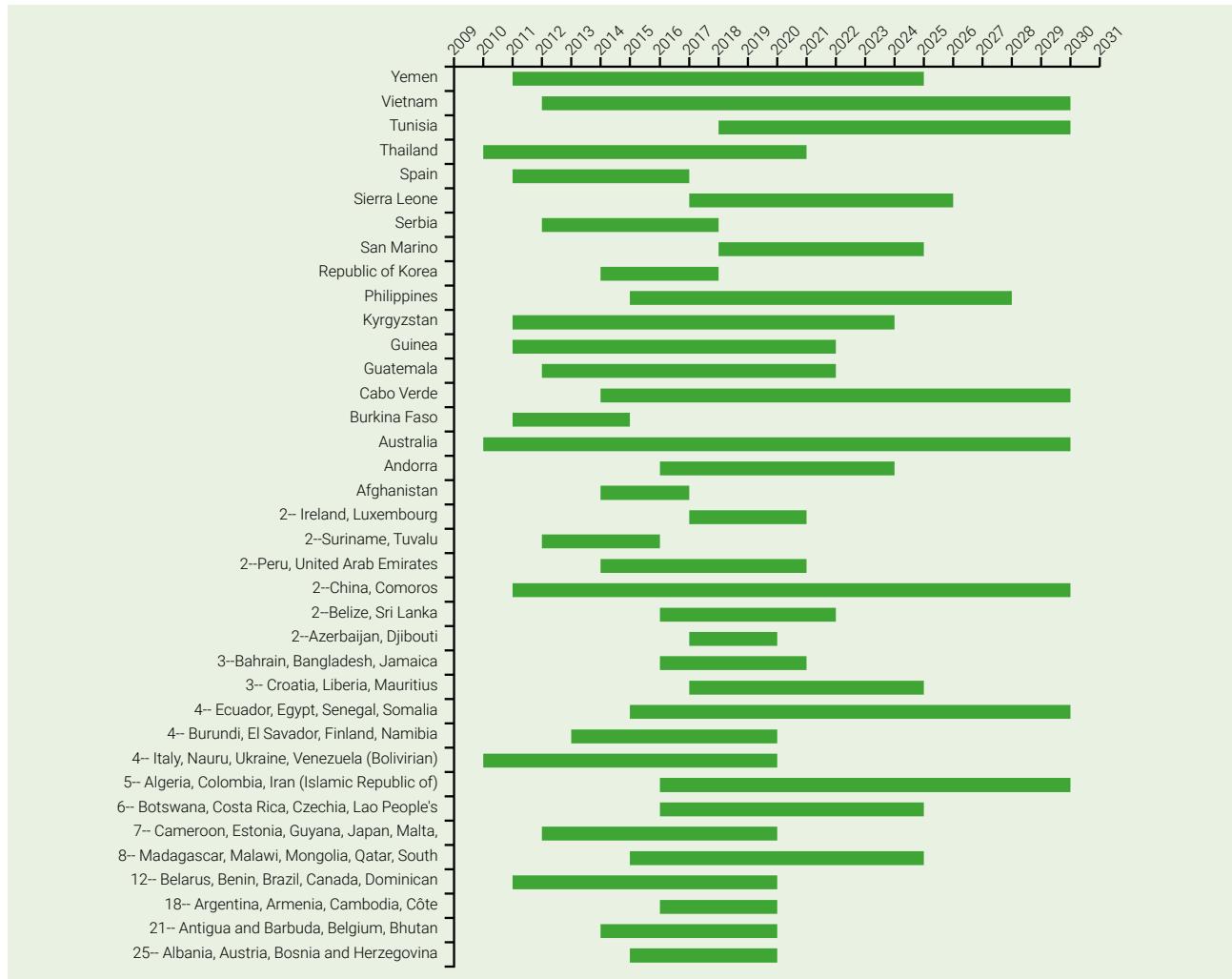
The number of countries with post-2010 NBSAPs ending in 2020 is 93 (62 per cent).



The following chart displays the 150 parties with post-2010 NBSAP durations (parties with the same start and end dates have been grouped together).

Missing information: Latvia, Syrian Arab Republic and Tajikistan

Post-2010 (up-to-date) NBSAPs grouped



Below is a list of the grouped NBSAP durations shown above:

2015–2020: Albania, Austria, Bosnia and Herzegovina, Brunei Darussalam, Congo, Ethiopia, Gambia (The), Guinea-Bissau, Hungary, Indonesia, Iraq, Jordan, Lithuania, Mozambique, Myanmar, Nicaragua, Niue, Paraguay, Poland, Republic of Moldova, Samoa, Sao Tome & Principe, Seychelles, Sudan, United Republic of Tanzania (25 parties)

2014–2020: Antigua and Barbuda, Belgium, Bhutan, Chad, Denmark, Dominica, Eritrea, Georgia, Germany, Greece, India, Liechtenstein, Mali, Nepal, Netherlands, Niger, Romania, Russian Federation, Saint Kitts and Nevis, Slovakia, Zimbabwe (21 parties)

2016–2020: Argentina, Armenia, Cambodia, Côte d'Ivoire, Cuba, Democratic Republic of the Congo, Ghana, Grenada, Kiribati, Montenegro, Morocco, New Zealand, Nigeria, Norway, Rwanda, Solomon Islands, Swaziland, Uruguay (18 parties)

2011–2020: Belarus, Benin, Brazil, Canada, Dominican Republic, Equatorial Guinea, European Union, France, Mauritania, Timor-Leste, Togo, United Kingdom of Great Britain and Northern Ireland (12 parties)

2015–2025: Madagascar, Malawi, Mongolia, Qatar, South Africa, Uganda, Uzbekistan, Zambia (8 parties)

2012–2020: Cameroon, Estonia, Guyana, Japan, Malta, Sweden, Switzerland (7 parties)

2016–2025: Botswana, Costa Rica, Czechia, Lao People's Democratic Republic, Malaysia, Maldives (6 parties)

2016–2030: Algeria, Colombia, Iran (Islamic Republic of), Lebanon, Mexico (5 parties)

2010–2020: Italy, Nauru, Ukraine, Venezuela (Bolivarian Republic of) (4 parties)

2013–2020: Burundi, El Salvador, Finland, Namibia (4 parties)

2015–2030: Ecuador, Egypt, Senegal, Somalia (4 parties)

2017–2025: Croatia, Liberia, Mauritius (3 parties)

2017–2020: Azerbaijan, Djibouti (2 parties)

2016–2021: Bahrain, Bangladesh, Jamaica (3 parties)

2016–2022: Belize, Sri Lanka (2 parties)

2011–2030: China, Comoros (2 parties)

2014–2021: Peru, United Arab Emirates (2 parties)

2012–2016: Suriname, Tuvalu (2 parties)

2017–2021: Ireland, Luxembourg (2 parties)

There are a few very common NBSAP durations, particularly 2015–2020 (25 parties), 2014–2020 (21 parties) and 2016–2020 (18 parties). Their dates are similar and represent 43 per cent of all post-2010 NBSAPs.

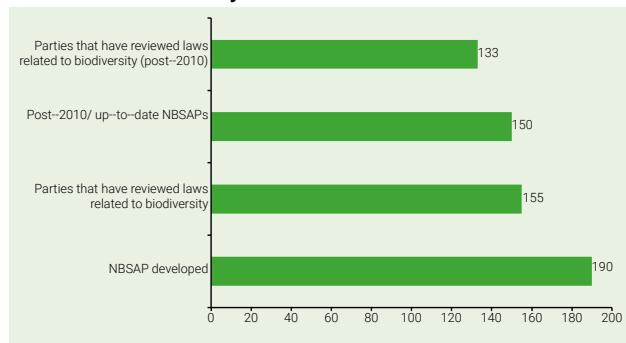
33 post-2010 NBSAPs have durations of 10 years or longer (22 per cent).

Only one post-2010 NBSAP has a duration of 20 years or longer (0.7 per cent).

Parties that have reviewed their laws related to biodiversity

Missing information: Algeria, Latvia, Syrian Arab Republic and Tajikistan

Reviewed biodiversity laws in NBSAPs



82 per cent of parties with NBSAPs have reviewed their laws related to biodiversity.

89 per cent of parties with post-2010 NBSAPs have reviewed their laws related to biodiversity.

Legal measures in NBSAPs

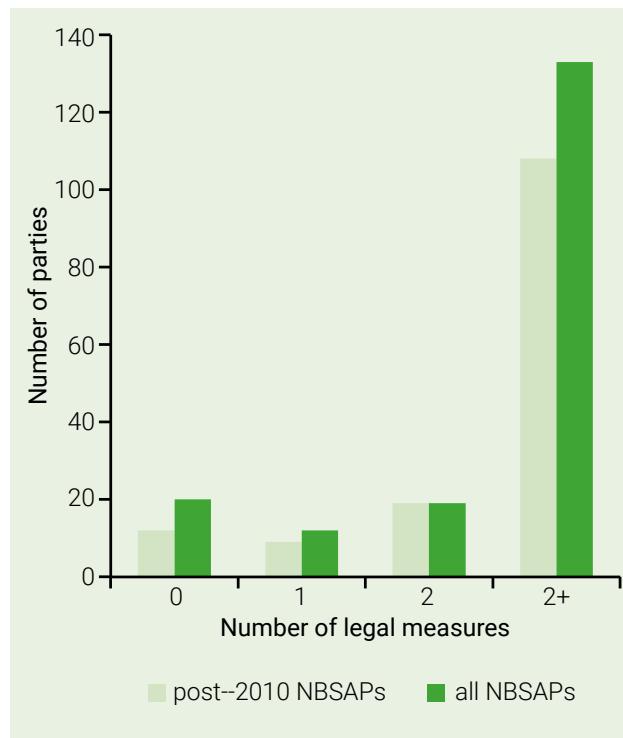
164 parties have distinctly written legal measures within their NBSAPs.

136 parties have distinctly written legal measures within their post-2010 NBSAPs.

The following chart displays the spread of legal measures among submitted NBSAPs, that is, the number of the 190 parties with NBSAPs or 150 parties with post-2010 NBSAPs that have zero, one or two, or more than two distinctly written legal measures in their NBSAPs.

Missing information: Algeria, Israel, Latvia, Syrian Arab Republic and Tajikistan

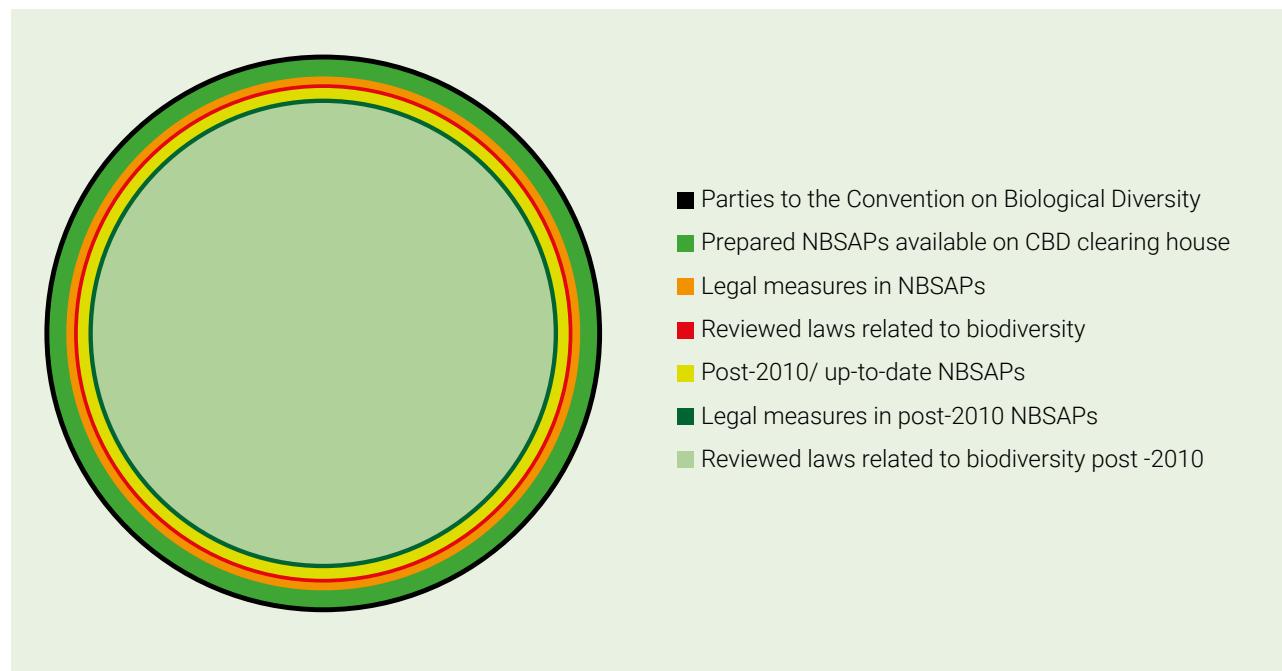
Legal measures in NBSAPs

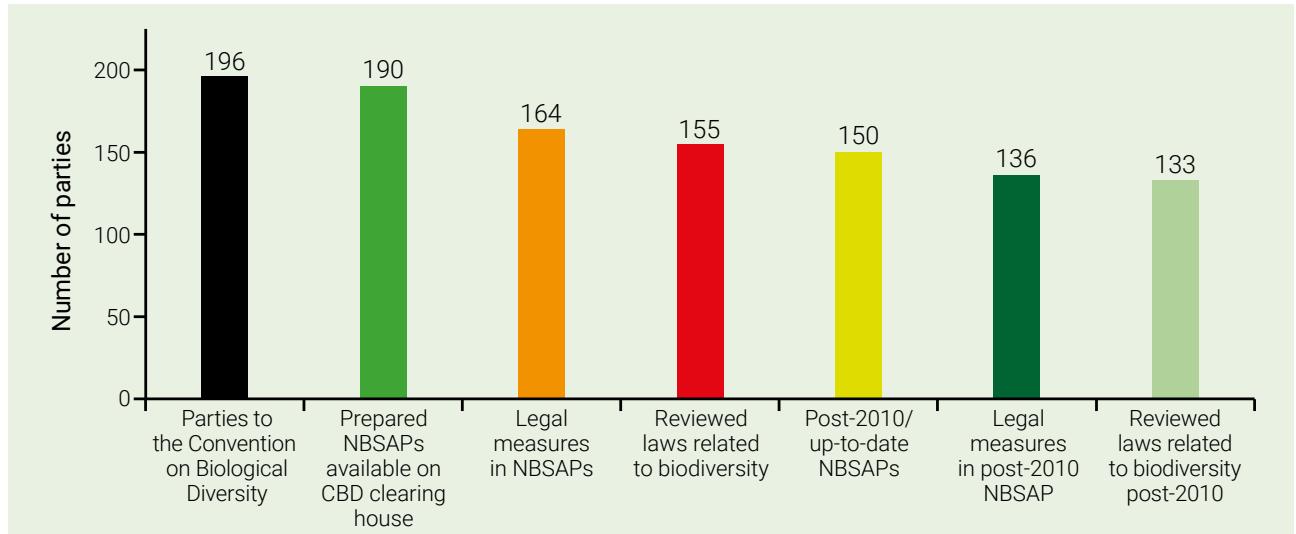


KEY

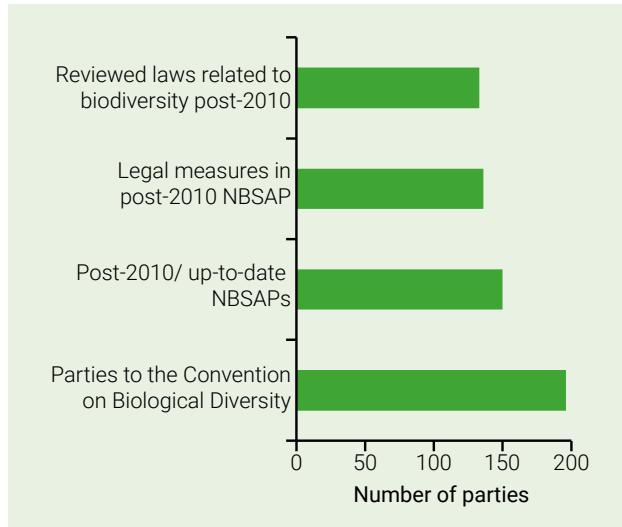
| Number of legal measures | Parties with NBSAPs | Percentage (against 190 parties with NBSAPs) | Parties with post-2010 NBSAPs | Percentage (against 150 parties with post-2010 NBSAPs) |
|--------------------------|---------------------|--|-------------------------------|--|
| With legal measures | 164 | 86 | 136 | 91 |
| 0 | 20 | 11 | 12 | 8 |
| 1 | 12 | 6 | 9 | 6 |
| 2 | 19 | 10 | 19 | 13 |
| 2+ | 133 | 70 | 108 | 72 |

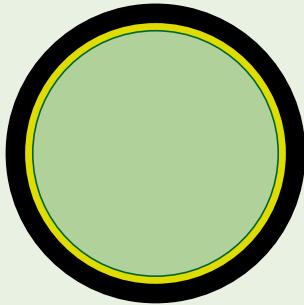
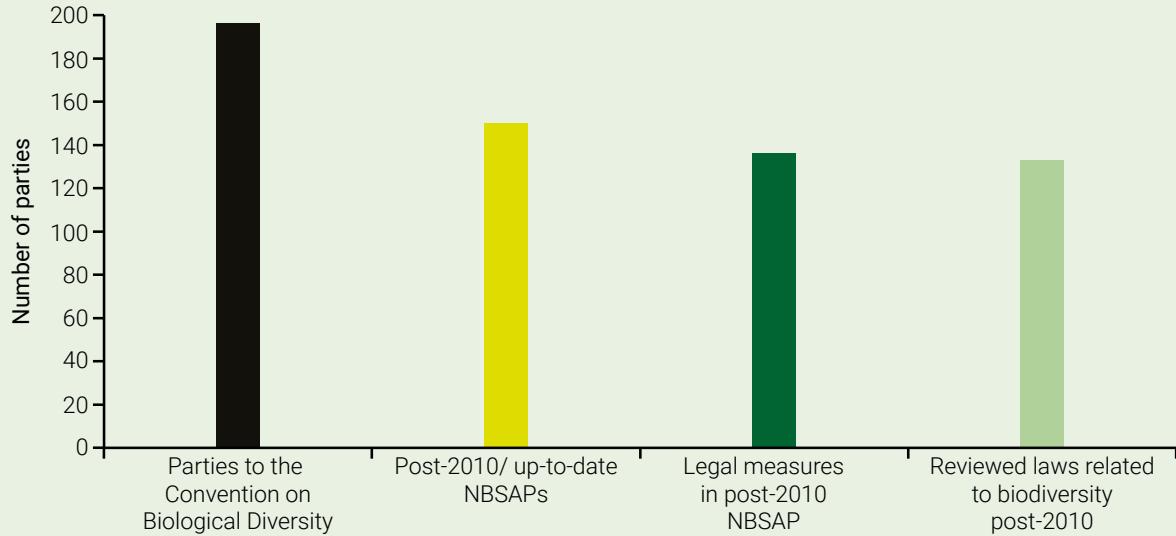
Compilation of findings





Compilation of post-2010 findings





- Parties to the convention on Biological Diversity
- Post-2010/up-to-date NBSAPs
- Legal measures in post-2010 NBSAP
- Reviewed laws related to biodiversity post-2010



Conclusions

- ❖ Almost all parties (190 parties, or 97 per cent) have fulfilled the requirement to prepare an NBSAP.
- ❖ Most parties (150 parties, or 77 per cent) have submitted new or revised NBSAPs following the adoption of the Strategic Plan for Biodiversity 2011–2020.
- ❖ The median and mode start and end dates of all NBSAPs are 2015 and 2020 respectively.
- ❖ The median and mode post-2010 NBSAP durations are six years and five years respectively.
- ❖ 43 per cent of post-2010 NBSAPs fall within the duration of 2014–2020, 2015–2020 or 2016–2020 (64 parties).
- ❖ 62 per cent of post-2010 NBSAPs end in 2020 (94 parties).
- ❖ Only 22 per cent of post-2010 NBSAPs have a duration of 10 years or longer (33 parties).
- ❖ Only 1 (0.7 per cent) post-2010 NBSAP has a duration of 20 years or longer.
- ❖ 82 per cent of parties (155) with NBSAPs have reviewed their laws related to biodiversity.
- ❖ 89 per cent of parties (133) with post-2010 NBSAPs have reviewed their laws related to biodiversity.
- ❖ 164 parties (86 per cent of parties with NBSAPs) have distinctly written legal measures within their NBSAPs.
- ❖ 136 parties (91 per cent of parties with post-2010 NBSAPs) have distinctly written legal measures within their post-2010 NBSAPs.
- ❖ 70.5 per cent of NBSAPs have more than two legal measures in their NBSAPs.
- ❖ 72 per cent of post-2010 NBSAPs have more than two legal measures.

An aerial photograph of a coastal landscape. In the foreground, there are rugged, light-colored cliffs with patches of green vegetation. The ocean is a deep blue-green, with white waves crashing against the shore. A sandy beach is visible in the middle ground. In the background, there are rolling hills covered in dense green forest under a clear blue sky.

Sources

VIII. Sources

Conventions and protocols

Convention of Biological Diversity, 1992. <https://www.cbd.int/doc/legal/cbd-en.pdf>.

Cartagena Protocol on Biosafety to the Convention on Biological Diversity, 2000. <https://www.cbd.int/doc/legal/cartagena-protocol-en.pdf>.

Nagoya Protocol on Access to Genetic Resources and the Fair and Equitable Sharing of Benefits Arising from Their Utilization to the Convention on Biological Diversity, 2010. <https://www.cbd.int/undb/media/factsheets/undb-factsheet-nagoya-en.pdf> and <https://www.cbd.int/abs/doc/protocol/nagoya-protocol-en.pdf>.

Convention on the Conservation of Migratory Species of Wild Animals, 1979. <http://www.cms.int/en/convention-text>.

Convention on International Trade in Endangered Species of Wild Fauna and Flora, 1973. <https://cites.org/eng/disc/E-Text.pdf>.

United Nations Framework Convention on Climate Change, 1992. http://unfccc.int/files/essential_background/background_publications_htmlpdf/application/pdf/conveng.pdf.

Kyoto Protocol to the United Nations Framework Convention on Climate Change, 1998. <http://unfccc.int/resource/docs/convkp/kpeng.pdf>.

Paris Agreement, 2015 (under the United Nations Framework Convention on Climate Change). http://unfccc.int/files/essential_background/convention/application/pdf/english_paris_agreement.pdf.

United Nations Convention to Combat Desertification in Those Countries Experiencing Serious Drought and/or Desertification, Particularly in Africa, 1994. http://catalogue.unccd.int/936_UNCCD_Convention_ENG.pdf.

International Treaty on Plant Genetic Resources for Food and Agriculture, 2001. <ftp://ftp.fao.org/docrep/fao/011/i0510e/i0510e.pdf>.

Resolutions and decisions

Decision IX/5 on forest biodiversity. <https://www.cbd.int/doc/decisions/cop-09/full/cop-09-dec-en.pdf>.

Decision IX/8 on the review of implementation of goals 2 and 3 of the Strategic Plan <https://www.cbd.int/doc/decisions/cop-09/full/cop-09-dec-en.pdf>.

Decision IX/12 on access and benefit-sharing. <https://www.cbd.int/doc/decisions/cop-09/full/cop-09-dec-en.pdf>.

Decision IX/28 on promoting engagement of cities and local authorities. <https://www.cbd.int/doc/decisions/cop-09/full/cop-09-dec-en.pdf>.

Decision X/1 on access to genetic resources and the fair and equitable sharing of benefits arising from their utilization. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-01-en.pdf>.

Decision X/2 on the Strategic Plan for Biodiversity 2011–2020 and the Aichi Biodiversity Targets. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-02-en.pdf>.

Decision X/5 on implementation of the Convention and the Strategic Plan. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-05-en.pdf>.

Decision X/10 on national reporting: review of experience and proposals for the fifth national report. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-10-en.pdf>.

Decision X/15 on scientific and technical cooperation and the clearing-house mechanism.

<https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-15-en.pdf>.

Decision X/16 on technology transfer and cooperation. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-16-en.pdf>.

Decision X/17 on consolidated update of the Global Strategy for Plant Conservation 2011–2020.

<https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-17-en.pdf>.

Decision X/19 on gender mainstreaming. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-19-en.pdf>.

Decision X/21 on business engagement. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-21-en.pdf>.

Decision X/22 on the Plan of Action on Subnational Governments, Cities and Other Local Authorities for Biodiversity.

<https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-22-en.pdf>.

Decision X/29 on marine and coastal biodiversity. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-29-en.pdf>.

Decision X/30 on mountain biological diversity. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-30-en.pdf>.

Decision X/31 on protected areas. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-31-en.pdf>.

Decision X/32 on sustainable use of biodiversity. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-32-en.pdf>.

Decision X/33 on biodiversity and climate change. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-33-en.pdf>.

Decision X/34 on agricultural biodiversity. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-34-en.pdf>.

Decision X/35 on biodiversity of dry and sub-humid lands. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-35-en.pdf>.

Decision X/37 on biofuels and biodiversity. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-37-en.pdf>.

Decision X/39 on the Global Taxonomy Initiative. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-39-en.pdf>.

Decision X/44 on incentive measures. <https://www.cbd.int/doc/decisions/cop-10/cop-10-dec-44-en.pdf>.

Decision XI/3 on monitoring progress in implementation of the Strategic Plan for Biodiversity 2011–2020 and the Aichi Biodiversity Targets.

<https://www.cbd.int/kb/record/decision/13164?RecordType=decision>.

Decision XI/4 on review of implementation of the strategy for resource mobilization, including the establishment of targets.

<https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-04-en.pdf>.

Decision XI/5 on the financial mechanism. <https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-05-en.pdf>.

Decision XI/6 on cooperation with other conventions, international organizations, and initiatives.

<https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-06-en.pdf>.

Decision XI/8 on engagement of other stakeholders, major groups and subnational authorities.

<https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-08-en.pdf>.

Decision XI/24 on protected areas. <https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-24-en.pdf>.

Decision XI/25 on sustainable use of biodiversity: bush-meat and sustainable wildlife management.

<https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-25-en.pdf>.

Decision XI/26 on the Global Strategy for Plant Conservation. <https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-26-en.pdf>.

Decision XI/27 on biofuels and biodiversity. <https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-27-en.pdf>.

Decision XI/29 on the Global Taxonomy Initiative. <https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-29-en.pdf>.

Decision XI/30 on incentive measures. <https://www.cbd.int/doc/decisions/cop-11/cop-11-dec-30-en.pdf>.

Decision XII/1 on mid-term review of progress in implementation of the Strategic Plan for Biodiversity 2011–2020 including the fourth edition of the Global Biodiversity Outlook, and actions to enhance implementation.

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-01-en.pdf>.

Decision XII/2 on review of progress in providing support in implementing the objectives of the Convention and the Strategic Plan for Biodiversity 2011–2020, and enhancement of capacity-building, technical and scientific cooperation and other initiatives to assist implementation. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-02-en.pdf>.

Decision XII/4 on integrating biodiversity into the post-2015 United Nations development agenda and the sustainable development goals.

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-04-en.pdf>.

Decision XII/5 on biodiversity for poverty eradication and sustainable development.

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-05-en.pdf>.

Decision XII/7 on mainstreaming gender considerations. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-07-en.pdf>.

Decision XII/8 on stakeholder engagement. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-08-en.pdf>.

Decision XII/9 on engagement with subnational and local governments. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-09-en.pdf>.

Decision XII/10 on business engagement. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-10-en.pdf>.

Decision XII/11 on biodiversity and tourism development. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-11-en.pdf>.

Decision XII/12 on article 8 (j) and related provisions. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-12-en.pdf>.

Decision XII/13 on access and benefit-sharing. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-13-en.pdf>.

Decision XII/15 on the Global Strategy for Plant Conservation 2011–2020.

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-15-en.pdf>.

Decision XII/16 on invasive alien species: management of risks associated with introduction of alien species as pets, aquarium and terrarium species, and as live bait and live food, and related issues. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-16-en.pdf>.

Decision XII/17 on invasive alien species: review of work and considerations for future work.

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-17-en.pdf>.

Decision XII/18 on sustainable use of biodiversity: bushmeat and sustainable wildlife management.

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-18-en.pdf>.

Decision XII/19 on ecosystem conservation and restoration. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-19-en.pdf>.

Decision XII/20 on biodiversity and climate change and disaster risk reduction.

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-20-en.pdf>.

Decision XII/21 on biodiversity and human health. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-21-en.pdf>.

Decision XII/22 on marine and coastal biodiversity: ecologically or biologically significant marine areas (EBSAs).

<https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-22-en.pdf>.

Decision XII/23 on marine and coastal biodiversity: Impacts on marine and coastal biodiversity of anthropogenic underwater noise and ocean acidification, priority actions to achieve Aichi Biodiversity Target 10 for coral reefs and closely associated ecosystems, and marine spatial planning and training initiatives. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-23-en.pdf>.

Decision XII/30 on financial mechanism. <https://www.cbd.int/doc/decisions/cop-12/cop-12-dec-30-en.pdf>.

United Nations General Assembly resolution 1803 (XVII) on permanent sovereignty over natural resources.

Publications and reports

- Barral, Virginie (2012). Sustainable Development in International Law: Nature and Operation of an Evolutive Legal Norm. *European Journal of International Law*, vol. 23, Issue 2, pp. 377–400. Available at <http://ejil.oxfordjournals.org/content/23/2/377.full#fn-86>.
- Biber-Klemm, Susette, and Sylvia I. Martinez. (2016). *Utilization of genetic resources and associated traditional knowledge in academic research: A good practice guide for access and benefit-sharing*. Bern, Switzerland: Swiss Academy of Sciences (SCNAT), Swiss Biodiversity Forum, page 15.
- Bilderbeek, Simone, and others (1992). *Biodiversity and International Law: The Effectiveness of International Environmental Law*. IOS Press.
- BirdLife International (2012). *Developing and Implementing National Biodiversity Strategies and Action Plans: How to Set, Meet and Track the Aichi Biodiversity Targets*. Cambridge, United Kingdom: BirdLife International.
- Birnie, Patricia, and others (2009). *International Law and the Environment*. 3rd ed. New York: Oxford University Press.
- Birnie, Patricia W., and Alan E. Boyle. (1995). *Basic Documents on International Law and the Environment*. Oxford: Oxford University Press, p. 390.
- Black, Henry Campbell (1968). *Black's Law Dictionary: Definitions of the Terms and Phrases of American and English Jurisprudence, Ancient and Modern*. 4th Edition. St. Paul: Minnesota: West Publishing Co. Online version available at <http://thelawdictionary.org/policy/>.
- Bodansky, Daniel M. (1995). "International Law and the Protection of Biological Diversity". *Vanderbilt Journal of Transnational Law*, vol. 28, pp. 623–634.
- Bodansky, Daniel, Jutta Brunnée and Ellen Hey (eds.) (2007). *The Oxford Handbook of International Environmental Law*. Oxford: Oxford University Press.
- Bodansky, Daniel, and Jutta Brunnée (1998). "The role of national courts in the field of international environmental law". In *Review of European Community and International Environmental Law*, vol. 7.1, 11–21.
- Boer, B.W. (2002). "Biodiversity Planning Law: International and National". in J Carew-Reid (ed.) *Biodiversity Planning in the Asian Region*, International Union for the Conservation of Nature and Natural Resources: Sri Lanka, pp. 531–537. Available at http://www.icem.com.au/documents/biodiversity/bioplan/biodiversity_law.pdf.
- Bosselmann, Klaus (2001). "Human Rights and the Environment: Redefining Fundamental Principles?". In Brendan Gleeson and Nicholas Low (eds.), *Governing for the Environment: Global Problems, Ethics and Democracy* (Basingstoke, Hampshire and New York: Palgrave, 2001) p. 126.
- Bowles-Newark, Nadine, and others (2014). *Incorporating and Utilizing Spatial Data and Mapping for NBSAPs: Guidance to Support NBSAP Practitioners*. Cambridge, United Kingdom: United Nations Environment Programme World Conservation Monitoring Centre.
- Brownlie, Ian (2008). *Principles of Public International Law*. 7th ed. Oxford: Oxford University Press, p. 32.
- Cabrera, Jorge, and others (2012). "Designing Future Just Laws on Biodiversity: Training Materials for Government Officials and Parliamentarians". Hyderabad, India: Centre for International Sustainable Development Law and World Future Council. Available at https://www.worldfuturecouncil.org/wp-content/uploads/2016/01/WFC_CISDL_2012_Designing_Future_Just_Laws_on_Biodiversity.pdf.
- Cabrera, Jorge, and others (2011). "Crafting Future Just Biodiversity Laws & Policies". Centre for International Sustainable Development Law and World Future Council. Available at http://cisdl.org/public/docs/legal/WFC_CISDL_Biodiversity_Laws_and_Policies_Report.pdf
- Cabrera Medaglia, Jorge, Freedom-Kai Phillips and Frederic Perron-Welch (2014). *Biodiversity Legislation study: A Review of Biodiversity Legislation in 8 Countries*. Hamburg, Germany, Montreal, Canada and London: Global Legislators' Organization, World Future Council and the Centre for International Sustainable Development Law.
- Carew-Reid, Jeremy (2002). *Biodiversity Planning in Asia*. Gland, Switzerland, and Cambridge, United Kingdom: International Union for Conservation of Nature, 2002.

- Cassese, Antonio (2005). "The implementation of international rules within national systems". In *International Law*, Antonio Cassese, ed. Oxford: Oxford University Press.
- Charney, Jonathan (1995). "Biodiversity: Opportunities and Obligations". In *Vanderbilt Journal of Transnational Law*, vol. 28, No. 4 (October).
- Cooney, Rosie (2004). *The Precautionary Principle in Biodiversity Conservation and Natural Resource Management: An issues paper for policy-makers, researchers and practitioners*. Gland, Switzerland, and Cambridge, United Kingdom: International Union for Conservation of Nature.
- Convention of Biological Diversity, "Update on Progress in Revising/Updating and Implementing National Biodiversity Strategies and Action Plans, Including National Targets" (UNEP/CBD/COP/13/8/Add.1).
- Convention on International Trade in Endangered Species of Wild Fauna and Flora (2011). "Contributing to the development, review, updating and revision of National Biodiversity Strategies and Action Plans (NBSAPs): A Draft Guide for CITES Parties" (April).
- Convention on the Conservation of Migratory Species of Wild Animals. Guidelines on the Integration of Migratory Species into National Biodiversity Strategies and Action Plans (NBSAPs) and Other Outcomes from CBD COP10.
- Convention on the Conservation of Migratory Species of Wild Animals (2015). CMS and NBSAPs. Available at http://www.cms.int/manage/sites/default/files/uploads/6_CMS_and_NBSAPs_WS_Philippines2015.pdf.
- de Klemm, Cyrille, and Clare Shine (1993). *Biological Diversity Conservation and the Law: Legal Mechanisms for Conserving Species and Ecosystems*. Environmental Policy and Law Paper No. 29. Gland, Switzerland, and Cambridge, United Kingdom: International Union for Conservation of Nature. Available at <https://portals.iucn.org/library/sites/library/files/documents/EPLP-029.pdf>.
- Denza, Eileen (2010). "The relationship between international and national law". In *International Law*, Evans, ed. Oxford: Oxford University Press.
- Dudley, Nigel, and others (2005). "Towards Effective Protected Area Systems: An Action Guide to Implement the Convention on Biological Diversity Programme of Work on Protected Areas", Technical Series no. 18. Montreal, Canada: Secretariat of the Convention on Biological Diversity.
- Durwood Zaelke, Donald Kaniaru and Eva Kruzikova (eds.) (2005). *Making Law Work: Environmental Compliance and Sustainable Development*. London: Cameron May.
- Emerton, Lucy (2001). *National Biodiversity Strategies and Action Plans: A Review of Experiences, Lessons Learned and Ways Forward*. Karachi, Pakistan: International Union for Conservation of Nature Regional Environmental Economics Programme for Asia.
- Food and Agriculture Organization of the United Nations (2002). "Cross-sectoral Policy Impacts between Forestry and other Sectors: Summaries of Findings and Opinions of Participants". Rome: Forestry Department Technical Meeting, 18–20 September 2002. Available at <http://www.fao.org/forestry/4494-02925c192f0fa9d77af9de82cd47859a6.pdf>.
- Food and Agriculture Organization of the United Nations (2003). "Understanding Cross-sectoral Policy Impacts: Policy and Legal Aspects". Rome: United Nations. Available at http://www.fao.org/docrep/006/Y4653E/y4653e04.htm#P0_0.
- Global Development Research Centre, The Rio Summit's Principle 10 and its Implications. Available at <http://www.gdrc.org/decision/principle-10.html>.
- Rose, Gregory L. (2011). *National and Global Environmental Laws: Dichotomy and interlinkages as examined through the implementation of multilateral environmental agreements*. Paper prepared for the first preparatory meeting of the World Congress on Justice, Governance and Law for Environmental Sustainability, Kuala Lumpur, October 2011.
- Rose, Gregory L. (2011). "Gaps in the Implementation of Environmental Law at the National, Regional and Global Level". First preparatory meeting of the World Congress on Justice, Governance and Law for Environmental Sustainability, Kuala Lumpur, October 2011.
- Handl, Günther. Declaration of the United Nations Conference on the Human Environment (Stockholm Declaration), 1972 and the Rio Declaration on Environment and Development, 1992. Available at http://legal.un.org/avl/pdf/ha/dunche/dunche_e.pdf.
- Henson, David W., and others (2016). *Wildlife Law Enforcement in Sub-Saharan African Protected Areas: A Review of Best Practices*. Occasional Paper of the International Union for the Conservation of Nature and Natural Resources Species Survival Commission No. 58. Cambridge,

- United Kingdom, and Gland, Switzerland: International Union for Conservation of Nature, 2016.
- International Development Law Organization (2012). "The Legal Preparedness for Achieving the Aichi Biodiversity Targets Initiative: What is Legal Preparedness About?". Available at <http://www.idlo.int/what-we-do/initiatives/aichi-what-legal-preparedness-about>.
- International Development Law Organization (2016a). "Review of Post-2010 National Biodiversity Strategies and Action Plan: Legal Preparedness for Biodiversity Mainstreaming". Available at <http://www.idlo.int/sites/default/files/pdf/initiatives/NBSAP%20Review%20of%20Legal%20Preparedness%20for%20Biodiversity%20Mainstreaming%20-%20FINAL.pdf>.
- Islam, Nazrul, and others (2001). *Environmental Law in Developing Countries: Selected Issues*. International Union for the Conservation of Nature Environment Policy and Law Paper No. 43. Gland, Switzerland, and Cambridge, United Kingdom, CDG, Berlin, Germany and ZAV, Bonn, Germany: International Union for Conservation of Nature, 2001.
- Kelsen, Hans (1945). *General Theory of Law and the State*. Cambridge, Massachusetts: Harvard University Press, pp. 363–80.
- Kim, Rakhyn E. (2016). "The Nexus Between International Law and the Sustainable Development Goals". In *Review of European, Comparative and International Environmental Law*, Special Issue: The SDGs and International Environmental Law, Volume 25, Issue 1, pages 15–26.
- Lofts, Katherine, and Freedom-Kai Phillips (2008). Japan Basic Act on Biodiversity, 2008. Published in Phillips, Freedom-Kai, *Legal Resources on the Japan Basic Act on Biodiversity*.
- Martin, Paul, and others (2016). *Framework for Assessing and Improving Law for Sustainability*. Gland, Switzerland: International Union for Conservation of Nature.
- Millennium Ecosystem Assessment (2005). *Ecosystems and Human Well-being: Synthesis*. Washington, D.C.: Island Press. Available at <http://www.millenniumassessment.org/documents/document.356.aspx.pdf>.
- Mitchell, Andrew and Jennifer Beard (2009). *International Law: In Principle*. Pymont, Australia: Lawbook Company, Chap.3.
- Morgera, Elisa, and others (2014). *Unraveling the Nagoya Protocol: A Commentary on the Nagoya Protocol on Access and Benefit-sharing to the Convention on Biological Diversity*. Martinus Nijhoff.
- Pisupati, Balakrishna (2014). Options and Approaches for Realizing Target 16 of the Aichi Biodiversity Targets. Fridtjof Nansen Institute.
- Pisupati, Balakrishna, and Christian Prip (2015). *Interim Assessment of Revised National Biodiversity Strategies and Action Plans (NBSAPs)*. Cambridge, United Kingdom: United Nations Environment Programme World Conservation Monitoring Centre, and Lysaker, Norway: Fridtjof Nansen Institute. Available at <https://www.cbd.int/doc/nbsap/Interim-Assessment-of-NBSAPs.pdf>.
- Rios, Montserrat, and Arturo Mora (2014). *Access to Genetic Resources in Latin America and the Caribbean: Support Tools for Implementation*. Quito, Ecuador: International Union for Conservation of Nature – United Nations Environment Programme/Global Environment Facility – Access and Benefit Sharing regimes in Latin America and the Caribbean.
- Sands, Philippe, and others (2012). *Principles of International Environmental Law* (3rd ed.). Cambridge, United Kingdom: Cambridge University Press.
- Schrijver, Nico, and Friedl Weiss (2004). *International Law and Sustainable Development: Principles and Practice*. Leiden, the Netherlands: Martinus Nijhoff.
- Secretariat of the Convention on Biological Diversity (2010). *Global Biodiversity Outlook 3*. Montréal, Canada: Convention on Biological Diversity. Available at <https://www.cbd.int/gbo3/?pub=6667§ion=6711>.
- Secretariat of the Convention on Biological Diversity (2014a). "Progress Towards the Aichi Biodiversity Targets: An assessment of biodiversity trends, policy scenarios and key actions". *Global Biodiversity Outlook 4* (GBO-4), Technical Report Series No. 78. p. 396. Available at <https://www.cbd.int/doc/publications/cbd-ts-78-en.pdf>.
- Secretariat of the Convention on Biological Diversity (2014b). *Global Biodiversity Outlook 4*. Montréal, Canada: Convention on Biological Diversity, p.13. Available at <https://www.cbd.int/gbo/gbo4/publication/gbo4-en-hr.pdf>.
- Snape, William J. (1996). *Biodiversity and the Law*. Washington, D.C.: Island Press.
- Teclaff, Ludwik A., and Albert E. Utton (1974). *International Environmental Law*. New York: Praeger.
- United Nations Development Programme, Biodiversity Planning Support Programme: A Guide for Countries Preparing National Biodiversity Strategies and Action Plans.

- United Nations Environment Programme (2002). *Guidelines on Compliance with and Enforcement of Multilateral Environmental Agreements*. Nairobi.
- United Nations Environment Programme (2006). *Manual on Compliance with and Enforcement of Multilateral Environmental Agreements*. Nairobi.
- United Nations Environment Programme (2010). *Auditing the Implementation of Multilateral Environmental Agreements (MEAs): A Primer for Auditors*. Nairobi: United Nations Environment Programme Division of Environmental Law and Conventions. Available at https://wedocs.unep.org/bitstream/handle/20.500.11822/17290/Auditing_Implementation_of_MEAs.pdf?sequence=1&isAllowed=y.
- United Nations Environment Programme (2016a). *Enhancing cooperation among the seven biodiversity-related agreements and conventions at the national level using national biodiversity strategies and action plans*. Nairobi: United Nations Environment Programme.
- United Nations Environment Programme (2016b). *Elaboration of options for enhancing synergies among biodiversity related conventions*. Nairobi: United Nations Environment Programme. Available at <https://wedocs.unep.org/rest/bitstreams/35154/retrieve>
- United Nations Environment Programme (2016c). *Role of Multilateral Environmental Agreements (MEAs) in Achieving the Sustainable Development Goals (SDGs)*. Nairobi: United Nations Environment Programme. Available at <https://wedocs.unep.org/rest/bitstreams/35153/retrieve>
- United Nations Environment Programme and the National Environment Protection Agency of Afghanistan, *A Guide to Afghanistan's 2007 Environment Law*.
- United Nations Environment Programme, *Strengthening the Capacity of Southeast Asian Countries for the Implementation of the Biodiversity Strategic Plan 2011–2020 and Aichi Biodiversity Targets: Experiences and Good Practices in China and ASEAN on Biodiversity Planning and Implementation*.
- Van Dyke, Fred (2008). "The Legal Foundations of Conservation Biology". In *Conservation Biology: Foundations, Concepts, Applications*, 2nd edition. Dordrecht, the Netherlands: Springer.
- Vereniging van Inheemse Dorpschoufden (Association of Indigenous Village Leaders in Suriname) (2012). "An Analysis of International Law, National Legislation, Judgements and Institutions as they Interrelate with Territories and Areas Conserved by Indigenous Peoples and Local Communities". Report No. 11: Suriname. Bangalore, India: Natural Justice, and Pune and Delhi, India: Kalpavriksh.
- Watts, Arthur and C.J. Greenwood (eds.) (1955). *Oppenheim's International Law*. 8th ed., (vol. 1, p. 37).
- Wittmer, Heidi and HariPriya Gundimeda (eds.) (2012). *The Economics of Ecosystems and Biodiversity in Local and Regional Policy and Management*. London and Washington D.C.: Earthscan.
- World Commission on Environment and Development (1987). *Our Common Future*. Oxford: Oxford University Press.
- Zelli, Fariborz, and Harro van Asselt (2013). "The Institutional Fragmentation of Global Environmental Governance: Causes, Consequences, and Responses". In *Global Environmental Politics* 13(3), pp. 1–13. Massachusetts: Massachusetts Institute of Technology Press Journals.
- General Assembly resolution 70/1, *Transforming our world: the 2030 Agenda for Sustainable Development*. Available at http://www.un.org/ga/search/view_doc.asp?symbol=A/RES/70/1&Lang=E.
- Nagoya Declaration on Parliamentarians and Biodiversity (26 October 2010).
- Report of the World Summit for Social Development (Copenhagen Declaration on Social Development and Programme of Action of the World Summit for Social Development) 1995. Available at http://www.un.org/en/development/desa/population/migration/generalassembly/docs/globalcompact/A_CONF.166_9_Declaration.pdf.
- Hague Ministerial Declaration of the Conference of Parties to the Convention on Biological Diversity.

Training modules

Convention on Biological Diversity, NBSAP Capacity Building Modules: <https://www.cbd.int/nbsap/training/>.

Convention on Biological Diversity Training Module 1: An introduction to national biodiversity strategies and action plans: <https://www.cbd.int/doc/training/nbsap/b1-train-intro-nbsap-revised-en.pdf>.

Convention on Biological Diversity Training Module 2: Using the biodiversity planning process to prepare or update a national biodiversity strategy and action plan: <https://www.cbd.int/doc/training/nbsap/b2-train-prepare-update-nbsap-revised-en.pdf>.

Convention on Biological Diversity Training Module 3: Mainstreaming biodiversity into national sectoral and cross-sectoral strategies, policies, plans and programs: <https://www.cbd.int/doc/training/nbsap/b3-train-mainstream-revised-en.pdf>.

Convention on Biological Diversity Training Module 4: Setting national biodiversity targets in line with the framework of the Strategic Plan for Biodiversity 2011–2020, including Aichi Biodiversity Targets: <https://www.cbd.int/doc/training/nbsap/b4-train-national-targets-revised-en.pdf>.

Convention on Biological Diversity Training Module B-1: An introduction to national biodiversity strategies and action plans (version 1, July 2007): <https://www.cbd.int/doc/training/nbsap/b1-train-intro-nbsap-en.pdf>.

Convention on Biological Diversity Training Module B-2: The biodiversity planning process: how to prepare and update a national biodiversity strategy and action plan (version 1, July 2007): <https://www.cbd.int/doc/training/nbsap/b2-train-prepare-update-nbsap-en.pdf>.

Convention on Biological Diversity Training Module B-3: Mainstreaming biodiversity into sectoral and cross-sectoral strategies, plans and programmes (version 1, July 2007): <https://www.cbd.int/doc/training/nbsap/b3-train-mainstream-en.pdf>.

Convention on Biological Diversity Training Module B-4: Setting national biodiversity targets, making use of the Convention on Biological Diversity's framework for the 2010 biodiversity target (version 1, July 2007): <https://www.cbd.int/doc/training/nbsap/b4-train-national-targets-en.pdf>.

Convention on Biological Diversity Training Module B-5: Ensuring inclusive societal engagement in the development, implementation and updating of NBSAPs (version 2, revised July 2012): <https://www.cbd.int/doc/training/nbsap/b5-train-stakeholder-nbsap-revised-en.pdf>.

Convention on Biological Diversity Training Module B-6: Getting political support for the NBSAP and financing its implementation (version 1, July 2007): <https://www.cbd.int/doc/training/nbsap/b6-train-political-support-finance-nbsap-en.pdf>.

Convention on Biological Diversity Training Module B-7: Communication strategy for issues in NBSAPs (version 1, July 2007): <https://www.cbd.int/doc/training/nbsap/b7-train-communication-strategy-nbsap-en.pdf>.

Convention on Biological Diversity Training Module 8: Biodiversity planning for states, provinces, cities and other local authorities: how to develop a sub-national biodiversity strategy and action plan: <https://www.cbd.int/doc/training/nbsap/b8-train-biodiversity-plan-subnational-en.pdf>.

Convention on Biological Diversity Training Module 9 (B series): Mainstreaming Gender Considerations in the Development and Implementation of National Biodiversity Strategies and Action Plans, Version 1 – July 2012: <https://www.cbd.int/doc/training/nbsap/b9-train-gender-en.pdf>.

Website links

2015–2020 Gender Plan of Action under the Convention on Biological Diversity: <https://www.cbd.int/gender/action-plan/>.

A toolkit for communication, education and public awareness: <http://www.cepatoolkit.org/>.

Aichi Biodiversity Targets: <https://www.cbd.int/sp/targets/>.

Australian Environment Protection and Biodiversity Conservation Act 1999: <https://www.environment.gov.au/epbc>.

Australian legislation for environmental protection: <https://www.environment.gov.au/about-us/legislation>.

Guidance on NBSAPs from the Conference of the Parties to the Convention on Biological Diversity: <https://www.cbd.int/nbsap/guidance.shtml>.

Convention on Biological Diversity, Introduction to access and benefit-sharing: <https://www.cbd.int/abs/infokit/brochure-en.pdf>.

Centre for International Sustainable Development Law: <http://www.cisd.org/index.php>.

Centre for International Sustainable Development Law, "Biodiversity legislation study"
<http://www.cisd.org/aichilex/files/Biodiversity%20Legislation%20Study.pdf>.

Convention on the Conservation of Migratory Species of Wild Animals and NBSAPs: <http://www.cms.int/en/education/capacity-building/nbsaps>.

ECOLEX ("the Gateway to Environment Law"): <http://www.ecolex.org/>.

ECOLEX as a gateway to biodiversity-related law: <https://www.cbd.int/ecolex/>.

Environmental Law Alliance Worldwide (ELAW): <http://www.elaw.org/resources/topical.asp?topic=Polluter%20Pays%20Principle>.

EU Forest Watch: <http://fern.org/resources>

Fifth replenishment of the Global Environment Facility (GEF-5) support for NBSAPs:
<https://www.cbd.int/nbsap/guidance-tools/finance/default.shtml>.

Find National Targets (that contribute to the implementation of the Aichi Biodiversity Targets):
<https://www.cbd.int/nbsap/targets/default.shtml>.

Find NBSAPs and national reports: <https://www.cbd.int/nbsap/search/default.shtml>.

International Development Law Organization: <http://www.idlo.int/what-we-do/sustainability/biodiversity>.

Latest NBSAPs: <https://www.cbd.int/nbsap/about/latest/default.shtml>.

Liaison Group of Biodiversity-related Conventions: <https://www.cbd.int/blg/>.

National Biodiversity Authority of India: <http://nbaindia.org/>.

National reports: <https://www.cbd.int/reports>.

NBSAP capacity-building modules: <https://www.cbd.int/nbsap/training/default.shtml>.

NBSAP capacity-building workshops: <https://www.cbd.int/nbsap/workshops/default.shtml>.

NBSAP notifications: <https://www.cbd.int/nbsap/notifications/default.shtml>.

NBSAPs – other guidance: <https://www.cbd.int/nbsap/guidance-tools/guidelines.shtml>.

NBSAPs website: <https://www.cbd.int/nbsap/>.

Regional biodiversity strategies and action plans (RBSAPs): <https://www.cbd.int/nbsap/related-info/region-bsap/default.shtml>.

Resources for implementing outcomes of the Conference of the Parties to the Convention:

<https://www.cbd.int/nbsap/guidance-tools/other/default.shtml>.

Strategic Plan for Biodiversity 2011–2020, including Aichi Biodiversity Targets: <https://www.cbd.int/sp/>.

Subnational biodiversity strategies and action plans: <https://www.cbd.int/nbsap/related-info/sbsap/default.shtml>.

The NBSAP Forum: <http://nbsapforum.net/>.

United Kingdom Joint Nature Conservation Committee: <http://jncc.defra.gov.uk/page-1376>.

United Nations Environment Programme Environmental Governance website:

<https://www.unenvironment.org/explore-topics/environmental-governance/about-environmental-governance>.

United Nations Information Portal on Multilateral Environmental Agreements (InforMEA): <https://www.informea.org/en>

What is an NBSAP?: <https://www.cbd.int/nbsap/introduction.shtml>.

Case law

Douglas v. Seacoast Products, Inc., 431 U.S. 265 (1977).

International Court of Justice. *Colombian-Peruvian asylum case, Judgment of November 20th 1950: I.C. J. Reports 1950, p. 266*.

International Court of Justice. *Gabčíkovo-Nagymaros Project (Hungary/Slovakia)*. ICJ Report (1997).

International Court of Justice. *Gabčíkovo-Nagymaros Project (Hungary/Slovakia)* ICJ Report (1997) 7, 140; World Trade Organization. *United States – Import Prohibition of Certain Shrimp and Shrimp Products*, WT/DS58/AB/R, Report of the Appellate Body, 12 October 1998, para 153 (the “*Shrimp Turtle*” case); and United Nations Commission on Human Rights resolution 2003/71 of 25 April 2003 on human rights and the environment as part of sustainable development.

International Court of Justice. *Military and Paramilitary Activities in and against Nicaragua (Nicaragua v. United States of America)*. Merits, Judgment, 27 June 1986. ICJ Report 1986, p. 98.

International Court of Justice. *Legality of the Threat or Use of Nuclear Weapons*. Advisory Opinion, ICJ Report 1996, p. 226, 8 July 1996; see also Permanent Court of International Justice, *The case of the “S.S. LOTUS” (France v. Turkey)*, Judgment, 1927.

International Court of Justice. *North Sea Continental Shelf Cases (Federal Republic of Germany v. Denmark and Federal Republic of Germany v. Netherlands)*, ICJ Report 1969, p. 3, 20 February 1969.

Other Sources

Background note: South-South experience-sharing workshop dealing with mainstreaming and synergies among the biodiversity-related conventions in the updated/revised post-2010 national biodiversity strategies and action plans (NBSAPs) (2016). Nairobi, March.

Available at

<http://wedocs.unep.org/bitstream/handle/20.500.11822/11301/south-south-nbsap-synergies-background-note.pdf?sequence=1&isAllowed=y>.

Contribution of the Convention on International Trade in Endangered Species of Wild Fauna and Flora to the New Strategic Biodiversity Plan 2011–2020 and Aichi Biodiversity Targets: https://cites.org/eng/news/sg/2011/20110909_SG_IISD_art.php.

Convention on the Conservation of Migratory Species of Wild Animals: Family Manual – Workshop for African National Focal Points, 29–31 Oct 2013, Cape Town, South Africa: <http://www.cms.int/en/meeting/cms-family-manual-workshop-african-national-focal-points>.

Convention on the Conservation of Migratory Species of Wild Animals. Implementation of NBSAPs. Available at http://www.cms.int/sites/default/files/document/presentation10_nbsaps.pdf.

International Development Law Organization (2016b). Legal Preparedness for achieving the Aichi Biodiversity Targets: the role of law for biodiversity incentives and financing. Paper presented at the South-South experience-sharing workshop. Nairobi, March. Available at <https://www.cbd.int/doc/meetings/fin/ds-fb-02/other/ds-fb-02-presentation-19-en.pdf>.



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