9

Implementation: new approaches

9.1 Introduction

In the preceding chapter, we identified four stages in the process of compliance
with a primary environmental norm. We saw that the traditional approaches
used in international law to implement international obligations focus on the
first (information) and the fourth stages (reparation). The techniques dealing
with information gathering/reporting as well as with the characterisation of a
breach (through adjudication) and the determination of the ensuing legal
consequences (responsibility/liability) play a significant role in environmental
protection, but they also raise significant challenges. We identified in the
process going from compliance to non-compliance, a grey area characterised
by uncertainty as to the level of compliance (information without breach
characterisation). This area, which one might call the ‘soft belly’ of the com-
pliance process, is important for our discussion because it is the main target of
the implementation system of many environmental treaties.

This strategic choice is based on two main considerations. On the one hand, in
an environmental protection context, prevention is much more important than
the reparation of environmental damage, which is often very difficult.1 On the
other hand, the techniques relevant for the first and fourth stages assume that
non-compliance with an obligation is a matter of willingness rather than one of
financial and technological capacity.2 This assumption is not necessarily accurate
for all States. The costs and technical expertise involved in complying with
environmental treaties sometimes make their implementation difficult for
States that do not have the necessary resources. Moreover, even when a State
has the resources, minimising the costs associated with the implementation of
measures remains important to make compliance more efficient. These two
factors have led to the development of new approaches to implementation.
Figure 9.13 identifies the stages where these approaches intervene.

1 See Section 8.3.3.4 of Chapter 8.

2 See A. Chayes and A. Handler Chayes, The New Sovereignty, Compliance with International Regulatory Agreements (Cambridge MA: Harvard University Press, 1998).

3 See P.-M. Dupuy, ‘Où en est le droit international de l’environnement à la fin du siècle?’ (1997)
Revue generale de droit international public 873, in particular 893-5; J. E. Viñuales, ‘Managing

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Stage 1: Stage 2: Stage 3: Stage 4:

Information Facilitation Management Reparation

**Stages in the norm compliance process**

Figure 9.1: The ‘soft belly’ of the compliance process

The main techniques to facilitate compliance with environmental obliga-
tions (Stage 2) seek to provide ‘assistance’ and ‘efficiency’ gains (9.2). Technical
and financial assistance are intended to give developing States the means to
create the necessary infrastructure for the implementation of their environ-
mental obligations. Other techniques aim to increase efficiency so as to reduce
the cost of compliance with environmental obligations. The latter are relevant
for both developed and developing countries and they are usually structured
as market mechanisms. Regarding techniques to manage cases of non-
compliance (Stage 3), their purpose is to maintain the effectiveness of the
regime within reasonable bounds through a combination of renewed
assistance, diplomatic pressure and sanctions (9.3).

9.2 Techniques to facilitate compliance

9.2.1 Types of techniques

The analysis of techniques to facilitate compliance with environmental
standards presents several difficulties. The diversity of these techniques and
the specificities of each mechanism make them difficult to understand.
Moreover, their operation is as much about political and economic factors as
it is about law. It is therefore necessary to clarify the angle from which these
techniques will be discussed here.

Often, international environmental law textbooks provide a description of
various mechanisms such as development aid, environmental funds, technol-
ogy transfer, capacity building and others. In this way, the constitutive rules of
several instruments are presented succinctly without going into the details of

Abidance by Standards for the Protection of the Environment’, in A. Cassese (ed.), Realizing Utopia (Oxford University Press, 2012), pp. 326-39.

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their operation. This approach is understandable because, as noted earlier, the
techniques differ and each mechanism has features that cannot be analysed in
the limited context of a textbook, even a voluminous one. Our discussion
adopts a slightly different yet complementary approach. Instead of providing a
survey with a brief introduction to each mechanism, we focus on three aspects.

First, a key consideration in the context of this book is to clarify the nature of
the innovative implementation approaches adopted by environmental treaties.
This is why we emphasise the two goals pursued by the diverse range of
facilitation techniques, namely the provision of assistance and the generation
of efficiency gains. Second, given the significant number of potentially relevant
instruments, it is not possible to cover every eventuality succinctly. To over-
come this difficulty, we will select major illustrations of each technique, on the
basis of both their emblematic character and their practical importance. A
third aspect that we must consider is the particular angle adopted in the
analysis. After introducing the basic features of each mechanism, we will pay
particular attention to the legal issues that arise in their operation.

9.2.2 Techniques oriented towards assistance

9.2.2.1 Financial assistance

9.2.2.1.1 Overview

An important technique in the implementation of environmental agreements
is the provision of financial assistance. The term ‘financial assistance’ includes
a variety of public, private or even mixed mechanisms. These mechanisms are
often established to bridge the positions of developed and developing countries
in treaty negotiations. This was the case, for example, of the Multilateral Fund
of the 1987 Montreal Protocol.4 Indeed, the Fund was introduced in 1990 by an
amendment to the Protocol designed to bring certain developing countries, in
particular China and India, into the system. This mechanism, as several other
innovations introduced by the Montreal Protocol, profoundly influenced
the way differences between developed and developing countries came to be
managed in subsequent environmental negotiations. We will discuss this
mechanism in more detail later, but first it is useful to place it in the broader
context of financial assistance techniques. Figure 9.2 gives an overview of these
techniques.

More generally, in international negotiations the source of funding plays
an important role. Public finance is often preferred by developing countries
because it is, in theory, more predictable,5 although the commitments of
developed countries in this area are not always respected and often have

4 Montreal Protocol on Substances that Deplete the Ozone Layer, 16 September 1987, 1522 UNTS
3 (‘Montreal Protocol’). See also the Terms of Reference for the Multilateral Fund, 25 November
1992, UNEP/OzL.Pro.4/15, Annex IX (‘Terms of Reference for the Multilateral Fund’).

5 Report of the United Nations Conference on Environment and Development, A/CONF.151/26/ Rev.l (Vol. l), Resolution 1, Annex 2: Action 21 (‘Action 21’), para. 33.11(b).

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**Public**

**General Environmental**

ODA (Official

Development **General Specific**

Assistance)

**Finance**

**Mixed Private**

**Hybrid Leveraged Direct SRI**

**Mechanisms finance Investment**

PCF (Prototype GEF Flexible mechanisms Private funds

Carbon Fund) (CDM and JI)

GEF (Global

World Bank Environmental

Facility) Regional Banks

World Heritage
Fund

Multilateral Fund
(ozone)

Green Climate
Fund

Agreements on
access to genetic
resources and
benefit sharing
(ABS)

Payments for

ecosystem services
(PES), including

REDD-plus

General investment

Figure 9.2: Techniques of financial assistance

strings attached. In contrast, developed countries often argue the need for a
greater role of private finance, including through the liberalisation of capital
movements and easier access for foreign direct investment. Within public
finance, two distinct strands can be identified depending on whether finan-
cial resources are generally allocated to development or more specifically to
environmental protection. We cannot dwell here on the broader issue of
official development assistance (‘ODA’).6 Suffice it to note that the emphasis
on the provision of ‘new and additional’7 resources is intended to ensure that
financial assistance goes beyond the mere reallocation of ODA to environ-
mental projects. As for mechanisms focusing on environmental protection,
a further distinction can be made between general environmental funds (e.g.
the Global Environmental Facility or ‘GEF’) and treaty-specific ones (e.g. the
World Heritage Fund, the Multilateral Fund or the Green Climate Fund).
Regarding private finance, whether it is foreign direct investment, portfolio
investment,8 or simply commercial lending, its importance has been increas-
ingly recognised since the 1992 Earth Summit. The legal questions raised by
this source of finance will be discussed in Chapter 12. Another technique of
growing importance is mixed financing, often under the aegis of a develop-
ment bank or the GEF, which has mobilised substantial amounts of private
capital as part of its leveraged finance activities. Another example is the
Prototype Carbon Fund (‘PCF’) set up by the World Bank, which provides a
template for the creation of other hybrid funds at the domestic level.

These general observations about the types of financing set the background
for a more detailed analysis of three examples, namely treaty-specific

6 See P. Kohona, ‘UNCED - The Transfer of Financial Resources to Developing Countries’ (1992)

1 Review of European Community and International Environmental Law 307.

7 Action 21, supra n. 5, Chapter 33, particularly para. 33.1.

8 See B. J. Richardson, Socially Responsible Investment Law: Regulating the Unseen Polluters (Oxford University Press, 2008).

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environmental funds, the GEF and the PCF. The analysis of these mechanisms will emphasise their function as well as some selected legal questions.

9.2.2.1.2 Treaty-specific environmental funds

The first treaty-specific environmental fund was created in 1972 under Article

15 of the World Heritage Convention.9 Despite the modest amounts (approxi-
mately $4 million dollars annually) managed by the World Heritage Fund, this
mechanism is representative of a type of fund that we also find in other
environmental treaties, including the Ramsar Convention10 and the Basel
Convention.11 The World Heritage Fund is based on contributions from
States, partly compulsory and partly voluntary, as well as donations from
other entities, such as international organisations or private entities.12 The
amounts of the Fund are allocated to activities defined by the World Heritage
Committee established by the Convention and only to the extent of amounts
actually available.13 These activities primarily involve capacity-building of
States parties (provision of experts and training) and other forms of technical
assistance (studies and the supply of equipment). Certain amounts of the Fund
are allocated to maintain a reserve fund (referred to in Article 21(2) of the
Convention) whose purpose is to lend prompt assistance in emergencies, such
as the occurrence of natural disasters. The Committee has organised the target
activities into three categories according to their priority in fund allocation:14emergency assistance (particularly regarding the sites included on the List of
World Heritage in Danger15); support in the area of conservation and manage-
ment; and preparatory assistance. The current strategy of the Fund is consis-
tent with the broader trend of environmental funds to leverage additional
capital through co-finance of projects.16 Despite its iconic character, the World
Heritage Fund is only representative of a first - and rather modest - generation

9 Convention Concerning the Protection of the World Cultural and Natural Heritage, 16 November 1972, 1037 UNTS 151 (‘WHC’).

10 Ramsar Convention on Wetlands of International Importance, especially as Waterfowl Habitat,

2 February 1971, 996 UNTS 245 (‘Ramsar Convention’). The fund was established by the ‘Resolution on a Wetland Conservation Fund’, Resolution 4.3 (1990). In fact, this mechanism is known as the ‘Ramsar Small Grants Fund’.

11 Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and
 Their Disposal, 22 March 1989, 1673 UNTS 57 (‘Basel Convention’), Art. 14. The COP
 established a ‘General Trust Fund’ and a ‘Trust Fund for Technical Cooperation’. See
 ‘Financial Rules of the Conference of the Parties, its subsidiary bodies and the Secretariat of
 the Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and
 their Disposal’, Decision BC-10/28 (2011).

12 Financial Regulations of the World Heritage Fund, available at [www.whc.unesco.org](http://www.whc.unesco.org/) (last
 visited on 15 March 2013) (‘Financial Regulations’), Art. 3.1.

13 Ibid., Art. 4.

14 Guidelines for the Implementation of the World Heritage Convention, July 2012, WHC 12/01
 (‘Guidelines’), para. 235.

15 Ibid., para. 236.

16 Ibid., para. 225. See M. Bowman, P. Davies and C. Redgwell, Lyster’s International Wildlife Law
 (Cambridge University Press, 2nd edn, 2010), pp. 475-7 for concrete examples.

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of treaty-specific environmental funds.17 A second generation, capable of mobilising far more resources, was introduced with the establishment of the Multilateral Fund within the Montreal Protocol.

The Multilateral Fund is emblematic in two respects.18 On the one hand,
it is the first fund of the second generation, i.e. a fund large enough (more than
US$ 400 million for each period19) to finance ‘agreed incremental costs’ incurred
by developing countries as a result of the conversion of their infrastructure to
comply with an environmental treaty. On the other hand, the composition of its
governing body, the Executive Committee, which consists of seven developing
countries and seven developed countries (despite the fact that only the developed
countries contribute funds20), is an expression of the principle of common but
differentiated responsibilities.21 Created by an amendment to the Montreal
Protocol in June 1990, the Fund was established in 1991 and made permanent
in 1992 in order to cover the ‘agreed incremental costs’ (as designated under
Article 10(1) of the Protocol).22 These include costs arising from the conversion
or the premature decommissioning of facilities producing controlled substances,
the establishment of new facilities producing substitutes, the import of such
substitutes, or the use of relevant patents and designs, to name a few categories.23Decisions about funding are taken by the Committee by consensus or, failing
that, by two thirds of the members present and voting, provided that a double
majority of both developing and developed countries is respected.24 In practice,
the Committee has always acted by consensus. The implementation of this
system of financial assistance is managed by ‘implementing agencies’, in parti-
cular the United Nations Environment Programme (‘UNEP’), the United
Nations Development Programme (‘UNDP’), the World Bank25 and the
United Nations Industrial Development Organisation (‘UNIDO’). An example
may be useful to understand how this mechanism operates. In 2011,
the Executive Committee approved an amount of US$ 265 million to reduce
the use of hydrochlorofluorocarbons (‘HCFCs’) pursuant to Article 2E of the
Montreal Protocol.26 These substances are also potent greenhouse gases. The

17 On ‘generations’ of financial mechanisms, see L. Boisson de Chazournes, ‘Technical and
 Financial Assistance’, in D. Bodansky, J. Brunnée and E. Hey (eds.), The Oxford Handbook of
 International Environmental Law (Oxford University Press, 2007), pp. 948-72.

18 On this mechanism, see P. Lawrence, ‘Technology Transfer Funds and the Law: Recent
 Amendments to the Montreal Protocol on Substances that Deplete the Ozone Layer’ (1992) 4
 Journal of Environmental Law 15.

19 The periods were asfollows:1991-3,1994-6, 1997-9,2000-2,2003-5,2006-8,2009-11,2012-14.

20 Montreal Protocol, supra n. 4, Art. 10(5)-(6); Terms of Reference of the Executive Committee
 as Modified by the Ninth Meeting of the Parties in its Decision IX/16, 25 September 1997,
 UNEP/OzL.Pro.9/12, Annex V (‘Terms of Reference of the Executive Committee’), para. 2. The
 Terms of Reference have been revised several times.

21 See Chapter 3. 22 Montreal Protocol, supra n. 4, Art. 10(1).

23 Indicative List of Agreed Incremental Costs, 25 November 1992, UNEP/OzL.Pro.4/15, Annex VIII.

24 Montreal Protocol, supra n. 4, Art. 10(9).

25 Terms of Reference for the Multilateral Fund, supra n. 4, para. 2-7.

26 Montreal Protocol, supra n. 4, Art. 2F and Annex C (Group I).

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financial assistance is to be used for the conversion of hundreds of assembly lines
that currently use HCFCs. As part of this project, which should first freeze and
then reduce the consumption of HCFCs, China will be assisted by UNDP,
UNEP, UNIDO, the World Bank and the German and Japanese governments.27All in all, the Multilateral Fund can be characterised by reference to three key
features: coverage of ‘agreed incremental costs’ incurred by developing countries
to comply with the treaty; decision-making by a Committee with equal
membership of developed and developing countries; the implementation of
assistance by ‘implementing agencies’. As discussed next, negotiations on climate
finance have deviated from this template on some significant points.

The third illustration of a treaty-specific environmental fund is the recent
creation of the Green Climate Fund (‘GCF’).28 This Fund was established by a
decision of the Conference of the Parties (‘COP’) of the UN Framework
Convention on Climate Change (‘UNFCCC’)29 in December 2011, but it is
the result of a process that had already begun in 2006 and that was strength-
ened at the Copenhagen Conference in December 2009. The controversial
‘Copenhagen Accord’ focused on the creation of a fund to mobilise
considerable resources (US$ 100 billion per year in 2020), an idea that was
taken up by the ‘Cancun Agreements’ in December 2010 and crystallised at the
Durban Conference in 2011.30 Despite the fact that at the time of writing, the
GCF was only starting its financing operations, its institutional architecture
merits attention because it largely reflects the lessons accumulated over
decades of experience in the development of environmental funds. From this
standpoint, five main features must be highlighted.

First, regarding the decision-making power in respect of the allocation of the
funds, it is in the hands of a ‘Board’ with equal membership (twelve members
representing developed countries and twelve members representing develop-
ing countries).31 Decisions are taken by consensus and the Board has to adopt
regulations governing cases where consensus cannot be reached.32Significantly, the Board felt the need to define the term ‘consensus’,33 perhaps
because of the controversy over the scope of this principle raised by the
decision-making procedure of the UNFCCC COP in Cancun and Doha.

27 See ‘China Commits to Landmark Agreement on Dual Ozone and Climate Benefits’, 29 July
 2011, available at: [www.multilateralfund.org](http://www.multilateralfund.org/) (last visited on 15 March 2013).

28 Implementation of the Green Climate Fund, Decision 3/CP.17, 15 March 2012, FCCC/CP/
 2011/9/Add.1, Annex: Governing Instrument for the Green Climate Fund (‘GCF Instrument’).
 On this instrument, see L. Schalatek and S. Nakhooda, ‘The Green Climate Fund’, (November
 2012) 11 Climate Finance Fundamentals.

29 UN Framework Convention on Climate Change, 9 May 1992, 1771 UNTS 107 (‘UNFCCC’).

30 On climate negotiations, see supra Chapter 5. 31 GCF Instrument, supra n. 28, para. 9.

32 Ibid., para. 14.

33 Revised Draft Additional Rules of Procedure of the Board, 12 March 2013, GCF/B.01-13/02/
 Rev.01, Annex IX: Additional Rules of Procedure relating to Decision-making and Voting
 (‘Additional Rules of Procedure’), para. 1 (‘Decisions of the Board will be taken by consensus.
 Consensus exists when no objection is stated by any Board member or alternate member acting
 on behalf of a Board’).

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The second point concerns the Board’s relations with, on the one hand, the
COP and, on the other, the fund ‘Trustee’ (provisionally the World Bank).
The GCF is an independent entity, but it serves as a financial mechanism of the
UNFCCC under Article 11 of the convention. This places the GCF in a
subordinate position as regards the COP. The instrument establishing the
GCF only states that ‘arrangements will be concluded’ to this effect and sets
some general parameters, including the need to comply with the general
guidelines of, and submit annual reports to, the COP.34 In practice, this
formula conceals the divergent views between developing States (funding
recipients) who want more control of the GCF by the COP, and developed
countries that favour greater freedom. The divergence of views has also played
out in the election of the administrator (‘Trustee’) who actually receives and
holds the funds, even though it is managed in accordance with the decisions of
the Board. At the request of the COP (on the initiative of donor countries), the
World Bank acts as an interim Trustee for a period of three years.35

The third element is the source of the funds. The GCF is expected to become
the most important mechanism in terms of the funds mobilised. The objective
is to mobilise US$ 100 billion per year by 2020, although this target is probably
too ambitious. One way to come closer to this target would be to use available
public funds as the basis to raise much greater private funds. This is expressly
provided for in the GCF Instrument. In fact, paragraph 30 provides ‘[t]he Fund
may also receive financial inputs from a variety of other sources, public and
private, including alternative sources’.

A fourth important aspect of the architecture of the GCF is how it will organise
the distribution of the funds. This may include providing funds to implementing
entities or organisations in charge of funding specific projects or, conversely, the
GCF could directly undertake such funding activities, which would require a
more sophisticated administrative structure.36 The instrument suggests that the
first model will be followed, with the GCF channelling its resources through
international, regional but also national implementing entities accredited by the
Board.37 The role of domestic authorities is specifically addressed to ensure co-
ordination among the proposals submitted for funding in a given country and
consistency with the national mitigation and adaptation plans.

Finally, a fifth element characterising the GCF is that, unlike other funds, it
can cover not only ‘agreed incremental costs’ incurred by developing
countries but also ‘agreed full costs’ of projects related to adaptation, mitiga-
tion, technology transfer and capacity building.38 These are the basic features
of the GCF’s architecture. They owe much to a financial mechanism that we
will study next, namely the GEF.

34 GCF Instrument, supra n. 28, para. 6. 35 Ibid., para. 26.

36 Schalatek and Nakhooda, supra n. 28, p. 2. 37 GCF Instrument, supra n. 28, para. 45.

38 Ibid., para. 35.

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9.2.2.1.3 General environmental funds: the GEF

The Global Environmental Fund (‘GEF’)39 is the main example of a general
environmental fund that is not treaty-specific. Initially set up as a prototype
(1991-4), the GEF was established as an independent entity in 1994.40 As for the
GCF, we will focus on five main architectural features of the GEF, namely (i) the
decision-making power, (ii) relations with the COP, (iii) the source of funds,

(iv) the implementation of assistance, and (v) the type of costs covered. However,
the main feature of the GEF, when compared to other financial mechanisms, is
its general purpose or, in other words, its coverage of several areas, whether
addressed by specific treaty regimes (biodiversity, climate change, desertifica-
tion, depletion of the ozone layer and persistent organic pollutants) or not
(international waters).41 The GEF serves as the financial mechanism of several
environmental treaties, but it has a broader scope. This has often caused frictions
with the respective COPs, as discussed in this section.

Regarding, first, the decision-making power, it rests on a ‘Council’ composed
of thirty-two members (sixteen developing countries, fourteen developed coun-
tries and two transition States)42 that normally acts by consensus but, when
consensus is not possible, decisions are taken by a ‘double weighted majority’ (an
affirmative vote representing both a 60 per cent majority of the total number of
participants and a 60 per cent majority of the total contributions).43 This system
is a compromise between the interests of donor States (who favoured the
weighted system of the World Bank) and developing countries that supported
an equal-weight approach.

Relations between the GEF and COPs have raised a number of difficulties.
The origin of these is the tension between developing countries, which seek to
have greater control over the allocation of funds (via the COP), and developed
countries, in particular donors, which favour a more autonomous model. The
GEF has concluded agreements (‘memoranda of understanding’) with the
secretariats of the respective treaties, subsequently approved by the COPs
and annexed to a decision. However, as a general matter, relationships are
organised in a rather broad fashion, with the COPs having the power to
establish general policies for the allocation of funds and the GEF Council
keeping responsibility for making decisions on specific projects.44

Regarding the origin of the funds, they take the form of contributions by the
participant States to the ‘Trustee’, namely the World Bank, during four-year
periods of ‘replenishment’,45 which start with participants’ pledges to contribute

39 See A. S. Miller, ‘The Global Environmental Facility and the Search for Financial Strategies to
 Foster Sustainable Development’ (1999-2000) 24 Vermont Law Review 1229.

40 The instrument establishing the GEF was revised several times thereafter. For the current
 version, see ‘Instrument for the Establishment of the Restructured Global Environment
 Facility’ (October 2011) (‘GEF Instrument’).

41 Ibid., para. 2. 42 Ibid., para. 16. 43 Ibid., para. 25(b) and (c)(i).

44 Ibid., para. 6(a). See ‘Strengthening Relations with the Conventions in the GEF Network’, 21
 April 2011, GEF/C.40/15.

45 GEF Instrument, supra n. 40, para. 10.

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certain amounts. From this perspective, the GEF is a form of public finance. So
far, the GEF has undergone five replenishment periods and a sixth one was
initiated in 2013. Since its inception until 2013, the GEF had invested approxi-
mately US$ 11.5 billion in about 3,200 projects related to its areas of interven-
tion. More important are the amounts from other sources, including private
sources, which have been leveraged through GEF activities (US$ 57 billion).
These ‘hybrid’ activities are undoubtedly one of the most realistic ways to
mobilise the amounts required to meet large-scale environmental challenges.
As already noted, the GEF is not the only mechanism that has leveraged its
impact through a resort to private funds. The growing role of private finance and
the market logic that drives its operations have been met with some reluctance
from developing countries, which see this source of financing as insufficiently
predictable and more difficult to manage. This is yet another manifestation of a
common tension between pragmatism and equity, which underpins many areas
of global environmental governance.

The financial assistance provided by the GEF is channelled through ‘implementing agencies’. These include, mainly, UNDP, UNEP, and the World Bank,46 although the GEF currently operates through ten implementing agencies, including the regional development and co-operation banks (African, Asian, European, and Inter-American).

Finally, as regards the type of expenditure covered by the GEF, in principle it
only covers ‘agreed incremental costs’ of measures taken within its areas of
intervention.47 We have characterised this notion in our analysis of the
Multilateral Fund of the Montreal Protocol, where this concept made its first
appearance. An exception to this principle concerns the ‘agreed full costs’
involved in performing the procedural obligations set out in Article 12(1) of
the UNFCCC, which may also be covered by the GEF.48

As suggested by the foregoing discussion, there are many common fea-
tures between the GEF and the more recent GCF. The architecture of the
latter is, indeed, based on the experience of the former. However, the GCF is
expected to go beyond the GEF in terms of resource mobilisation, interaction
with the private sector and the nature of covered costs. Conversely, the
GCF’s mandate is limited to climate change, even though the GCF
Instrument defines this area broadly encompassing its interactions with
other areas, such as the protection of biodiversity, particularly in respect of
projects to reduce deforestation (known as ‘REDD-plus’).49 More funda-
mentally, the GCF is a brand new instrument, and it has everything to prove,
whereas the GEF has already more than twenty years of operation and has
channelled dozens of billions of dollars towards environmental protection
projects.

46 Ibid., para. 22. 47 Ibid., para. 2. 48 Ibid., para. 6(a) in fine.

49 GCF Instrument, supra n. 28, para. 35.

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9.2.2.1.4 Hybrid mechanisms: the PCF

A hybrid financial mechanism that merits some attention is the Prototype
Carbon Fund (‘PCF’) established in 1999 under the aegis of the World Bank.50Despite the relatively modest amounts mobilised by the PCF (less than
US$ 200 million), this mechanism is interesting as an institutional experiment.
Its purpose is to facilitate the channelling of both public and private funds
(offered by companies such as Electrabel or Mitsubishi Corporation) towards
emissions reduction projects structured according to the rules of the Clean
Development (‘CDM’) and Joint Implementation (‘JI’) mechanisms set up by
the Kyoto Protocol.51

This is useful not only as a source of environmental finance but also as a
testing ground to further develop this type of mechanism. In addition to the
project management expertise accumulated by the PCF, the investor, whether
public or private, obtains emission reduction units, which it can use later to
fulfil its obligations in this area or to sell in the market for emission rights.

Despite the serious difficulties encountered in recent years by carbon
trading, especially due to the global economic crisis (with the ensuing excess
in the supply of emission rights) and the uncertain future of the Kyoto Protocol
(which, despite the adoption of a second commitment period, will probably
cease to impose quantifiable emissions targets in 2020), the contribution of the
PCF must not be underestimated. It has, among others, prompted the devel-
opment of similar mechanisms at the domestic level,52 and it could serve as a
model for other international initiatives of mixed funding.

9.2.2.2 Technical assistance

Technical assistance is closely related to financial assistance. Often, the latter
aims to finance former, whether in the form of capacity building (personnel
training, provision of experts or equipment, development of infrastructure and
administrative capacities)53 or the transfer of technology to developing coun-
tries (transfer of intellectual property rights or technical know-how to the
public or private sectors of the recipient country).54 There is some overlap in
the definition of these two types of technical assistance. By way of illustration,

50 IBRD, ‘Amended and Restated Instrument Establishing the Prototype Carbon Fund’,

Resolution No. 99-1 (‘PCF Instrument’). See D. Freestone, ‘The World Bank’s Prototype
Carbon Fund: Mobilising new Resources for Sustainable Development’, in S. Schemmer-
Schulte and K. Y. Tung (eds.) Liber Amicorum Ibrahim S. I. Shihata (The Hague: Kluwer,
2001), pp. 265-341.

51 Kyoto Protocol to the UN Framework Convention on Climate Change, 11 December 1997,
 2302 UNTS 148 (‘Kyoto Protocol’). See Chapter 5.

52 World Bank, Annual Report. Carbon Finance for Sustainable Development (2010), pp. 23-77.

53 See Action 21, supra n. 5, Chapter 37. More generally, see D. Ponce-Nava, ‘Capacity-Building in
 Environmental Law and Sustainable Development’, in W. Lang (ed.), Sustainable Development
 and International Law (London: Springer, 1995), pp. 131-6.

54 See Action 21, supra n. 5, Chapter 34. See also L. Gündling, ‘Compliance Assistance in
 International Environmental Law: Capacity-Building, Transfer of Finance and Technology’
 (1996)56 Zeitschrift für ausländisches öffentliches Recht und Völkerrecht 796.

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chapter 37 of Agenda 21 states that ‘(t)echnical cooperation, including that
related to technology transfer and know-how, encompasses the whole range of
activities to develop or strengthen individual and group capacities and
capabilities’.55 Similarly, chapter 34 of Agenda 21, on the transfer of ‘envir-
onmentally sound technologies’ refers repeatedly to the need to strengthen the
technical and institutional capacity in developing countries.56

However, in practice, the two forms of technical assistance have their own
distinctive features, and these specificities are important to understand the
place of technical assistance in the architecture of environmental treaties.
Capacity building is the type of technical assistance initially envisaged by
environmental treaties. The World Heritage Fund provides a good illustration
of this point.57 We saw that this Fund was established to assist States parties in
identifying sites of outstanding value, preparing the application to include
them in the World Heritage List as well as taking measures for their protection,
especially when they are threatened by circumstances such as natural disasters
or armed conflicts. This type of technical assistance can be distinguished from
certain forms of assistance envisaged by the Montreal Protocol and funded by
its Multilateral Fund. As noted earlier,58 the Montreal Protocol was amended
in 1990 to attract some developing States. The ‘London Amendment’ created
the Multilateral Fund, but it also introduced a provision (Article 10A) on the
‘transfer of technology’. To understand the scope of the Amendment, not only
as regards the ozone regime but, more generally, in relation to the issue of
technology transfer in international environmental law, it is useful to recall
some aspects of the negotiations of the Montreal Protocol.

The London Amendment helped to bring certain countries, such as China
or India, into the system of the Montreal Protocol. These countries (operating
under Article 5(1)) have undertaken obligations to eliminate the production
and consumption of controlled substances, which are broadly similar to the
obligations of developed countries (the main difference is the time-scale
applicable to each group). In exchange for this commitment, developed
countries agreed to cover the ‘agreed incremental costs’ incurred by
developing countries in complying with their obligations.59 But the deal was
not a mere question of finance. We have studied in Chapter 5 the context in
which the Montreal Protocol was negotiated and, in particular, the considera-
tions of international competitiveness raised by the search for substitutes
to controlled substances. In such a context, the commitment to no longer
produce/use certain substances, important from an industrial standpoint,
was not a realistic option for States that did not have substitutes, unless

(i) sufficient time was granted to gradually convert their industrial infrastruc-
ture, (ii) financial assistance was given to them, and (iii) intellectual property

55 Action 21, supra n. 5, para. 37.2. 56 Ibid., paras. 34.8, 34.14(d), 34.20, 34.22 and 34.26(b).

57 See supra Section 9.1.2.2. 58 See supra Section 9.1.2.2.

59 Indicative list of agreed incremental costs, supra n. 23.

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rights (‘IPRs’) and know-how relating to substitutes was transferred under reasonable conditions. These three considerations are important to understand the contents of the technology transfer provision (Article 10A) introduced by the London Amendment:

Each Party shall take every practicable step, consistent with the programmes supported by the financial mechanism to ensure:

(a) That the best available, environmentally safe substitutes and related
 technologies are expeditiously transferred to Parties operating under
 paragraph 1 of Article 5; and

(b) That the transfers referred to in subparagraph (a) occur under fair and most
 favourable conditions.

In other words, unlike capacity building, the transfer of technology poses, in
practice, important issues of IPRs and know-how protection and, thereby, of
international competitiveness. These questions concern not only the financing
of transfers but, more fundamentally, the provision of technologies. The
holders of IPRs may restrict access to certain technologies (refusing to grant
a licence) to prevent other companies (actual or potential) from developing
competing products. This question effectively arose in connection with indus-
tries in India and Korea, which were denied licences (even against payment) to
produce substitutes for substances regulated by the Montreal Protocol.60 Such
refusal meant that substitute products had to be purchased from the holder of
the patent. The Multilateral Fund can cover the costs of importing substitutes
but this is not a satisfactory solution to the problem because such assistance
depends on the availability of sufficient funds. Moreover, there is a question of
circularity to the extent that financial ‘assistance’ is being used to pay for the
products of companies based in donor countries. This case illustrates some
of the specific problems raised by technology transfer.

The interactions between IPRs and international environmental law will be
discussed in more detail in Chapter 12. For present purposes, suffice to draw
some general conclusions regarding technical assistance. A distinction can be
made between capacity building and technology transfer (as characterised
in this section). The second type of assistance raises specific problems of
competitiveness and IPRs protection. We illustrated this difference in the
context of the Montreal Protocol, but similar problems arise in other
contexts, such as the fight against climate change61 and the control of persis-
tent organic pollutants.62 The reference to India and China also highlighted the

60 See UNDP, Rapport sur le développement humain 2001 (Brussels: DeBoeck Université, 2001), p.
 109.

61 See K. E. Maskus, ‘Differentiated Intellectual Property Regimes for Environmental and Climate
 Technologies’, (2010) No. 17 OECD Environment Working Papers.

62 See ‘Endosulfan ban call inspired by European interests’, 29 April 2011, available at [www.news.](http://www.news./)
 agropages.com (last visited on 10 April 2013).

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tension between developed countries (which, as a rule, support the IPRs
holders) and developing countries (technology recipients). This tension
is reflected in legal terms by the ‘form’ in which technology transfer is
envisaged.63 While developed countries tend to favour lower tariffs applicable
to such environmental products64 (i.e. the export of substitution products),
developing countries emphasise the need for genuine technology transfer,
including the associated know-how, in favourable terms. Between these two
extremes, the lawyer must find intermediate solutions to preserve the essential
requirements of both sides. This research, which is strictly legal, is of consider-
able importance for the effectiveness of international environmental law.

One might ask, in this context, what are the instruments that can be used to
address this trade-off? There are several possibilities, ranging from the issuing
of compulsory licences to use IPRs65 to the implementation of specific
mechanisms for the development66 or sharing of technologies,67 in particular
through the creation of ‘markets’ of IPRs.68 A recent attempt to establish an
innovative instrument was made at the 2010 COP of the UNFCCC held in
Cancun. On this occasion, a ‘Technology Mechanism’ was created based on
two institutional pillars, namely a ‘Technology Executive Committee’ and a
‘Climate Technology Centre and Network’.69 The Committee’s function is
essentially to provide guidance for technology transfer policies, while the
Centre focuses on implementation. The Centre is currently managed by
a consortium of intergovernmental (including UNEP and UNIDO),
non-governmental and private organisations. The Centre is primarily
intended to share information and expertise but, for the time being, specific
references to the management of IPRs have been avoided. Of note is the
emphasis on encouraging entrepreneurship, partnerships between organisa-
tions of the ‘North’ and ‘South’ and foreign direct investment. This form of

63 The three ‘forms’ traditionally identified in economics, namely trade, licensing and foreign
 direct investment, have very different political and legal implications. On the economic
 approach, see W. Keller, ‘International Technology Diffusion’ (2004) 42 Journal of Economic
 Literature 752.

64 See OECD, Policy Brief: Opening Markets for Environmental Goods and Services (Paris: OECD,
 2005); R. Steenblink and J. A. Kim, ‘Facilitating Trade in Selected Climate Change Mitigation
 Technologies in the Energy Supply, Buildings, and Industry Sectors’, OECD Trade and
 Environment Working Paper, No. 2009-02 (4 May 2009).

65 See C. Correa, ‘Innovation and Technology Transfer of Environmentally Sound Technologies:
 The Need to Engage in a Substantive Debate’ (2013) 22 Review of European, Comparative and
 International Environmental Law 54, at 60.

66 See L. Diaz Anadon, ‘Missions-oriented RD&D Institutions in Energy Between 2000 and 2010:
 A Comparative Analysis of China, the United Kingdom, and the United States’ (2012) 41
 Research Policy 1742.

67 See Correa, supra n. 65.

68 A. H. B. Monk, ‘The Emerging Market for Intellectual Property: Drivers, Restrainers, and
 Implications’ (2009) 9 Journal of Economic Geography 469.

69 ‘The Cancun Agreements: Outcome of the work of the Ad Hoc Working Group on Long-term
 Cooperative Action under the Convention’, Decision 1/CP.16, 15 March 2011, Doc. FCCC/CP/
 2010/7/Add.1, paras. 117-27.

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investment could be a good compromise between the protection of IPRs (which remain in the hands of the investor) and the development of national infrastructure sought by developing countries, but it does have a number of problems, which are discussed in Chapter 12.

9.2.3 Techniques oriented towards efficiency (renvoi)

Techniques seeking efficiency gains, such as the market mechanisms introduced by the Kyoto Protocol, have been studied in Chapter 5. Here, it will suffice to recall why they reduce the costs of compliance with international environmental obligations.

We saw in Chapter 5 that the Kyoto Protocol established a number of
‘flexible mechanisms’ in the form of emissions trading (Article 17) and
project-based mechanisms (the JI (Article 6) and the CDM (Article 12)).
These mechanisms have several advantages. From the perspective of
assistance, they help channel funds to environmental projects and, as the
case may be, also to transfer certain technologies that help reduce emissions
as compared to a ‘business as usual’ (‘BAU’) scenario. Importantly, they can
also generate efficiency gains in developed countries. The costs of achieving
additional emissions reduction in countries like Switzerland or Germany,
whose production processes already employ modern technology, may be
much higher than achieving such reductions in countries where ‘dirtier’
technologies are still widespread. Thus, from a cost/benefit perspective, seek-
ing to reduce emissions in countries such as Switzerland or Germany is likely
to be less efficient than doing so in countries, such as China or Mexico, where
the margin of improvement is wider. This is important because the emissions
of carbon dioxide have the same impact on the global climate system
regardless of whether they stem from Switzerland or China. In this context,
mechanisms that allow countries like Switzerland to comply with their
obligations by achieving (directly or indirectly) emissions reductions in
countries (e.g. China) where this is cheaper clearly generate efficiency gains.
This is the reasoning underpinning the search for efficiency through market
mechanisms.70

Such an approach, however, also has its disadvantages. The main problem
relates to the wrong message that it may send to economic operators based in
developed countries, namely that there is no need to generate additional
emissions reductions in their own production processes because they can
offset any emissions at a lower cost in developing countries. It is for this reason
that the use of such ‘international measures’ was limited under the Kyoto
Protocol to a certain percentage of the reductions required by the quantified

70 For a more general discussion of the use of market mechanisms in environmental law, see

J. Freeman and C. Kolstad (eds.), Moving to Markets in Environmental Regulation. Lessons from Thirty Years of Experience (Oxford University Press, 2006).

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commitments. A similar, albeit much more generous, approach has been followed at the EU and domestic levels (e.g. in a non-member country such as Switzerland). Thus, efficiency techniques must be used within reasonable bounds so as to avoid undermining the core message of most environmental protection instruments: reduce the level of pollution.

9.3 Techniques to manage non-compliance

9.3.1 Non-compliance procedures

Non-compliance procedures (‘NCPs’) play a very important role in the implementation of environmental treaties.71 Their main objective is to ensure a satisfactory level of compliance with treaty obligations through the provision of financial or technical assistance or the adoption of a series of sanctions. The main components of NCPs will be analysed in the following sections. Here, we provide some background with respect to their historical origin, their approach to compliance and their main legal features.

Regarding the first element, like many other legal innovations, the origin of
NCPs can be found in the Montreal Protocol and, more specifically in its
Article 8, according to which: ‘[t]he Parties, at their first meeting, shall
consider and approve procedures and institutional mechanisms for determin-
ing non-compliance with the provisions of this Protocol and for treatment of
Parties found to be in non-compliance’. This provision was the basis for the
establishment of the first modern NCP, and the model greatly influenced the
treaties adopted after the Montreal Protocol as well as some older instruments
that subsequently established NCPs.

It is this model that has defined the general approach of compliance under-
lying NCPs. We have already referred to this approach in Chapter 2. Its two
main features are the non-confrontational character of the procedure and the
emphasis on the prevention of environmental damage. These two features are
closely related. Failure by a State to comply with an international obligation
may not be due to a lack of willingness to comply, but rather down to certain
technical or financial difficulties. In this context, NCPs are intended to help
the State concerned to return to a situation of compliance or, at least, to keep
non-compliance within reasonable bounds. In doing so, NCPs seek to prevent
or mitigate environmental damage resulting from non-compliance without
stigmatising the State concerned.72 In those cases where the breach results

71 On these procedures, see T. Treves et al. (eds.), Non-Compliance Procedures and Mechanisms
 and the Effectiveness of International Environmental Agreements (The Hague: TMC Asser Press,
 2009); S. Urbinati, Les mécanismes de contrôle et de suivi des conventions internationales de
 protection de l’environnement (Milan: Giuffrè, 2009).

72 See M. Koskenniemi, ‘Breach of Treaty or Non-Compliance? Reflections on the Enforcement of
 the Montreal Protocol’ (1992) 3 Yearbook of International Environmental Law 123.

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**Principal components**

**Legal basis**

**Explicit in Implicit Treaty**

**the treaty (COP dec.) Organ**

e.g. e.g. e.g.

Montreal Ramsar Montreal

Kyoto CITES Basel

Cartag. Basle CITES

Aarhus Aarhus

**Trigger**

**States parties**

**State Others
concerned**

e.g. All

Montreal e.g.

**Composition Outcomes**

**Private State reps. Indep. Assistance Requests for Warnings and**

**experts information sanctions**

e.g. e.g. e.g.

Aarhus Montreal e.g. Montreal e.g. e.g.

Alpine (Basel) Kyoto CITES Montreal Montreal

Aarhus Basel CITES CITES

Kyoto Kyoto Kyoto

Aarhus Aarhus Aarhus

Basel Montreal

Ramsar Kyoto

CITES Aarhus

Kyoto

Cartag. Injured

Aarhus e.g.

Basel
Cartag.

Figure 9.3: Overview of some NCPs

from State unwillingness to comply, some NCPs can be transmuted into
something close to a judicial proceeding leading to a finding of non-
compliance and even the adoption of sanctions. But, overall, the approach to
compliance underpinning NCPs is clearly focused on prevention and
assistance.

As for the main legal features of NCPs, they can be organised under four
headings, namely (i) their legal basis, (ii) the parties authorised to trigger them,
(iii) the composition of the compliance committees and (iv) the measures that
they can adopt.73

Figure 9.3 provides an overview of these features referring to some examples
drawn from specific NCPs (Montreal,74 Kyoto,75 Cartagena,76 Aarhus,77Ramsar,78 Basel,79 CITES,80 Alpine81). In what follows, we analyse each one
of these features in turn.

73 See Viñuales, supra n. 3, pp. 335-8.

74 ‘Non-compliance Procedure’, Decision IV/5, 25 November 1992, UNEP/OzL.Pro4/15, Annex
 IV (Report of the Parties) as subsequently amended (‘Montreal NCP’).

75 ‘Procedure and Mechanisms relating to Compliance under the Kyoto Protocol’, Decision 27/
 CMP.I, 30 March 2006, FCCC/KP/CMP/2005/8/Add.3, Annex (‘Kyoto NCP’).

76 ‘Establishment of Procedures and Mechanisms on Compliance under the Cartagena Protocol
 on Biosafety’, Decision BS-I/7, 27 February 2004, UNEP/CBD/BS/COP-MOP/1/15, Annex I
 (‘Cartagena NCP’).

77 ‘Review of Compliance’, Decision I/7, 2 April 2004, ECE/MP.PP/2/Add.8, Annex, (‘Aarhus
 NCP’).

78 ‘Mechanisms for Improved Application of the Ramsar Convention’, Recommendation
 REC.C.4.7 (Rev) Annex I.

79 ‘Establishment of a Mechanism for Promoting Implementation and Compliance’, Decision VI/
 12, 10 February 2003, UNEP/CHW.6/40 (2003), Annex, as amended by COP.10 (‘Basel NCP’).

80 ‘CITES Compliance Procedures’, Resolution Conf. 14.3, June 2007, Annex (‘CITES NCP’).

81 ‘Mechanism for the Verification of the Compliance with the Alpine Convention and its
 Implementation Protocols (Compliance Procedure)’, Decision XII/I, 7 September 2012,
 ACXII/A1/1, Annex (‘Alpine NCP’).

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9.3.2 The legal basis of NCPs and its implications

As a general matter, NCPs are based on a specific treaty provision. This is true
of many treaties concluded after the adoption of the Montreal Protocol. In
addition to Article 8 of this Protocol, examples include Article 18 of the Kyoto
Protocol, Article 34 of the Biosafety Protocol82 or Article 15 of the Aarhus
Convention,83 to name but a few. These provisions are then specified by a
stream of decisions adopted by treaty bodies (most often the COPs or, for
Protocols, the Meetings of the Parties or ‘CMPs’). Some other treaties have
established NCPs without an explicit legal basis. Examples include the
procedures established under the Ramsar Convention, the CITES84 and the
Basel Convention. This difference is mostly explained by the time at which
each treaty was adopted. Treaties adopted after the Montreal Protocol
generally (albeit not always, e.g. the Basel Convention) include a specific
provision regarding the establishment of an NCP, whereas previous
instruments have been updated through COP decisions.

This difference is not without legal significance since the existence of a legal
basis in the treaty may be important in determining the nature of the proceed-
ings and, in particular, whether the decision resulting from the NCP is binding
or not. It is a complex question that has not yet been settled, despite its practical
significance. To address this question it is necessary to distinguish three levels.

First, the binding character must be analysed in light of the specific context
of the treaty. It is at this level that the existence of a provision in the treaty is of
particular importance. For example, Article 18 of the Kyoto Protocol recog-
nises that decisions regarding compliance may be binding, but only if the NCP
was established by amendment (i.e. it has been ratified by the States con-
cerned). A contrario in the absence of such an amendment, the decisions are
technically not binding. Conversely, the underlying treaty may also expressly
provide for the optional and consultative nature of the NCP and thereby of the
decisions adopted by the NCP. Such is the case of Article 15 of the Aarhus
Convention. In other cases still, such as Article 8 of the Montreal Protocol or
Article 34 of the Biosafety Protocol, the treaty is silent as to the binding
character of decisions on compliance, which leads to the second level.

In such cases, the legal nature of these decisions must be analysed in the light
of the general powers of the treaty bodies and, in particular, the COP (or the
CMP). Some treaties authorise the CMP to adopt binding decisions. This is the
case of Article 2(9) of the Montreal Protocol or Article 7(4) of the Biosafety

82 Cartagena Protocol on Biosafety to the Convention on Biological Diversity, 29 January 2000,
 2226 UNTS 208 (‘Biosafety Protocol’).

83 Convention on Access to Information, Public Participation in Decision-making and Access to
 Justice in Environmental Matters, 25 June 1998, 2161 UNTS 447 (‘Aarhus Convention’).

84 Washington Convention on International Trade in Endangered Species of Wild Fauna and
 Flora, 3 March 1973, United Nations, 993 UNTS 243 (‘CITES’).

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Protocol.85 The existence of such provisions suggests that the CMP, in fact, has
the power to issue binding decisions in some cases (and therefore that it may
delegate this power). But these provisions are normally formulated so as to
restrict this power to specific types of decisions that do not necessarily
encompass decisions on non-compliance. In any event, where the treaty does
not give the possibility for the COP or CMP to adopt binding decisions, it
seems clear a fortiori that the NCP will not be entitled to do so. This conclusion
does not imply, however, that such decisions do not, in practice, have norma-
tive effects.

At the third level, it is important to determine whether the decisions arising
from the NCP are respected or not, or at least whether they carry some
authority.86 The question arose with respect to certain countries, notably
Greece, under the Kyoto Protocol.87 The Compliance Committee considered
that Greece had not complied with its obligations under Article 5(1) and 7 of
the Kyoto Protocol and found ‘Greece (to be) in non-compliance’. On this
basis, it directed Greece to ‘develop a plan referred to in paragraph 1 of section
XV and submit it within three months’ and, significantly, decided that in the
meantime Greece was ‘not eligible to participate in the mechanisms under
Articles 6, 12 and 17 of the Protocol pending the resolution of the question of
implementation’.88 This suspension of Greece was later lifted without any
explicit determination as to the binding nature of the Committee’s decision.89This case is often cited to emphasise the authority of NCP decisions in practice.
Among the numerous examples that could be mentioned to illustrate this
point,90 the decisions adopted by the Compliance Committee of the Aarhus
Convention are particularly apposite. Although Article 15 of the Convention
makes clear that decisions on compliance are not binding, the normative
power they display in practice can hardly be questioned. The recommenda-
tions made by the COP to States parties on the basis of the Committee’s
decisions have indeed been largely followed in practice.91

85 J. Brunnée, ‘COPing with Consent: Law-making under Multilateral Environmental

Agreements’ (2002) 15 Leiden Journal of International Law 1, 21-3.

86 Ibid., 23ff.

87 Compliance Committee, Final Decision: Greece, 17 April 2008, CC-2007-1-8/Greece/EB
 (‘Decision - Greece’). See also Compliance Committee, Final Decision: Croatia, 19 February
 2010, CC-2009-1-8/Croatia/EB.

88 Ibid., Annex, para. 18.

89 Compliance Committee, Final Decision: Greece, 13 November 2008, CC-2007-1-13/Greece/
 EB.

90 See M. Fitzmaurice, ‘Non-Compliance Procedures and the Law of Treaties’, in Treves et al,
 supra n. 71, pp. 453-81.

91 See A. Andrusevich, T. Alge and C. Konrad (eds.), Case Law of the Aarhus Convention
 Compliance Committee (2004-2011) (Lviv: RACSE, 2nd edn, 2011), in particular Part III
 synthesising the ‘outcomes’ of the actions taken by States to respond to the recommendations
 of the COP (made on the basis of those of the Committee).

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9.3.3 Triggering NCPs

A feature of NCPs that emphasises their fundamentally non-confrontational
nature concerns the ways they may be triggered. Unlike judicial proceedings,
NCPs can be triggered by the State that is in non-compliance.92 As discussed
later, self-triggering is linked to the possibility of applying for financial and/or
technical assistance. In addition to the State in non-compliance, NCPs may
also be triggered, depending on the cases, by (i) other States parties, (ii) some
treaty bodies or (iii) the public.

Some NCPs can be triggered by other States parties without the need for
them to prove that they have been particularly affected.93 Here we approach
the concept of actio popularis inter omnes partes (as opposed to the actio
popularis, which does not exist - yet - in general international law94). This
possibility is based on the nature of the object protected by the treaty (e.g. the
ozone layer, climate system, endangered species, a certain level of transparency
in environmental matters). Non-compliance by a State party is likely to affect
the common good protected by the treaty and, thereby, the interests of all other
States parties. When the treaty does not aim to protect a common resource
(e.g. environmental protection in a transboundary context), NCPs normally
give the right to initiate the procedure only to States specifically affected.95

As for the possibility given to some treaty bodies, e.g. the Secretariat, to
initiate the procedure, it may either apply to non-compliance with specific
obligations (e.g. procedural obligations96) or more generally to all treaty
obligations without distinction.97 This form of triggering has several advan-
tages. First, the treaty bodies centralise information on the implementation
of the treaty and are therefore in an ideal position to detect cases of non-
compliance. In addition, triggering by treaty bodies avoids confrontation
between States parties while producing similar results in the management of
non-compliance. Finally, treaty bodies may informally relay the concerns of
groups of civil society that are not usually allowed to initiate NCPs.

The latter point leads us to the third form of triggering, namely referral by
the public. This possibility has only been provided for in environmental
treaties of regional scope, such as the Alpine Convention98 or the Aarhus
Convention.99 It is thanks to this type of triggering that the Compliance
Committee of the Aarhus Convention has been able to develop an important

92 See, e.g., Montreal NCP, supra n. 74, para. 44; Basel NCP, supra n. 79, para. 9(a); Ramsar NCP,
 supra n. 78, para. 1; CITES NCP, supra n. 80, para. 19; Kyoto NCP, supra n. 75, para. VI.1(a);
 Cartagena NCP, supra n. 76, para. IV.1(a); Aarhus NCP, supra n. 77, para. 16.

93 See, e.g., Montreal NCP, supra n. 74, para. 1; NCP Kyoto, supra n. 75, para. VI.1(b); CITES
 NCP, supra n. 80, para. 18; Aarhus NCP, supra n. 77, para. 15.

94 See F. Voeffray, L’actio popularis ou la défense de l’intérêt collectif devant les juridictions
 internationales (Paris: Presse Universitaires de France, 2004).

95 See, e.g., Basel NCP, supra n. 79, para. 9(b); Cartagena NCP, supra n. 76, para. IV.1(b).

96 See, e.g., Basel NCP, supra n. 79, para. 9(c). 97 See, e.g., Montreal NCP, supra n. 74, para. 3.

98 Alpine NCP, supra n. 81, para. 2. 99 Aarhus NCP, supra n. 77, para. 18.

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body of ‘jurisprudence’ on ‘environmental democracy’. Indeed, the vast major-
ity of communications brought before the Committee come from civil society
groups. Note that it is not necessary to show a specific interest to use this
avenue. The rules on locus standi and admissibility make way for communica-
tions by non-governmental organisations with an interest of a general nature,
which allows them to contribute to compliance with the standards of
environmental transparency introduced by the Convention.100

9.3.4 Composition of NCP organs

The composition of NCP organs has some practical importance. The question
can be considered from several standpoints, depending on whether one is
interested in the geographical distribution of the members (as in the case of
environmental funds), the processes of nomination, or the capacity in which
members act. Generally, we distinguish between organs composed of
representatives of States and organs consisting of independent experts. The
nomination procedure can, however, blur these two categories to some extent
as ‘independent’ experts can be selected by States. In addition, representatives
of States can sometimes show some independence. But the distinction remains
useful to understand how NCPs function.

The NCP of the Montreal Protocol is governed by a body (the ‘Compliance
Committee’) consisting of ten State representatives elected by the COP for
a period of two years in accordance with an equitable geographical
distribution.101 The same applies to other compliance committees, such as
those established under the LRTAP Convention102 and the Espoo
Convention.103 At the other extreme, the NCP of the Kyoto Protocol is
governed by a complex organ (also a ‘Compliance Committee’) consisting of
twenty experts elected by the COP and acting in their independent capacity.104The Committee holds plenary sessions (twenty members), but also has two
branches (each with ten members) known as a ‘facilitative branch’ (whose
purpose is to provide assistance) and an ‘enforcement branch’ (which may
characterise situations of non-compliance and impose sanctions). The selec-
tion of members must also take into account geographic representation as well
as technical expertise.105 The Aarhus Compliance Committee is composed of
independent experts. It has eight members serving in a personal capacity (and
pro bono) who are recognised experts, including in the legal matters.106Between these two extremes, one finds other bodies, such as the committee

100 See Andrusevich et al., supra n. 91, pp. 102ff. 101 Montreal NCP, supra n. 74, para. 5.

102 Convention on Long-range Transboundary Air Pollution, 13 November 1979, 1302 UNTS 217
 (‘LRTAP Convention’).

103 Convention on Environmental Impact Assessment in a Transboundary Context, 25 February
 1991, 1989 UNTS 309 (‘Espoo Convention’).

104 Kyoto NCP, supra n. 75, para. II(3) and (6). 105 Ibid., para. II(6), IV(1) and V(1). 106 Aarhus NCP, supra n. 77, para. I(1)-(2).

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established under the Basel Convention, whose members are in fact representatives of States, although this may not be made explicit in the instrument establishing the NCP.107

The composition of the organs in charge of administering the NCPs can
explain how these procedures function. Aside from questions of indepen-
dence, which may be driven by personal considerations as much as by the
institutional structure of an organ, the composition helps to understand the
different approaches (whether technical or more political) favoured by each
organ. Commentators have observed that adopting a more political approach
runs the risk of making compliance ‘negotiable’.108 Yet, the political dimension
of NCPs may also be seen as a necessary feature of their operation to the
extent that they are mostly intended to manage non-compliance and not to
characterise a breach and determine the ensuing legal consequences.

9.3.5 Measures adopted by NCPs

We saw in Section 9.2.2 that the legal nature of the decisions adopted by NCPs
remains unsettled. However, we also noted that they have a significant normative
influence in practice. We must now complete the analysis through a survey of
different types of measures that can be adopted by compliance committees.

The primary objective of NCPs is to determine the reasons for non-
compliance and to provide financial and technical assistance. This is reflected
in the measures they are entitled to adopt. For example, the Facilitation Branch
of the Committee established under the Kyoto Protocol can conclude to the
‘(p)rovision of advice and facilitation of assistance’ or the ‘(f)acilitation of
financial and technical assistance, including technology transfer and capacity
building’.109 The same applies to all other committees that administer NCPs.
But the analysis of the causes of non-compliance in a given case may also lead to a
stronger stance, including the adoption of sanctions. These can range from simple
requests for additional information110 to the issuance of warnings111 or findings of
non-compliance,112 or even the adoption of real sanctions such as the suspension
of certain benefits under the respective treaty or the application of penalties.113

107 See Urbinati, supra n. 71, pp. 58-9.

108 See G. Handl, ‘Compliance Control Mechanisms and International Environmental

Obligations’ (1997) 9 Tulane Journal of International and Comparative Law 29, 37. 109 Kyoto NCP, supra n. 75, para. XIV.

110 See, e.g., Montreal NCP, supra n. 74, paras. 3 and 5(c); Basel NCP, supra n. 79, para. 22(a);
 CITES NCP, supra n. 80, para. 29(b); Cartagena NCP, supra n. 76, para. VI.1(d); Kyoto NCP,
 supra n. 75, para. IX(3).

111 See, e.g., Basel NCP, supra n. 79, para. 20(b); CITES NCP, supra n. 80, para. 29(c) and (g);
 Cartagena NCP, supra n. 76, para. VI.2(b); Aarhus NCP, supra n. 77, para. XII.37(f).
112 See, e.g., Montreal NCP, supra n. 74, para. 9; Kyoto NCP, supra n. 75, paras. IX(4)(a) and (7)
 and XV(1)(a); CITES NCP, supra n. 80, para. 29(g); Aarhus NCP, supra n. 77, para. XII.37(e). 113 See, e.g., Aarhus NCP, supra n. 77, para. XII.37(g); CITES NCP, supra n. 80, paras. 30 and 34;
 Kyoto NCP, supra n. 75, para. XV(5).

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The transition from facilitative measures to firmer measures is also characterised by the passage from a non-confrontational approach to a logic that is closer to the traditional methods of implementation in international environmental law studied in Chapter 8.

Select bibliography

Andrusevich, A., T. Alge and C. Konrad (eds.), Case Law of the Aarhus Convention
 Compliance Committee (2004-2011) (Lviv: RACSE, 2nd edn, 2011).
Biermann, F., ‘Financing Environmental Policies in the South: Experiences from the
 Multilateral Ozone Fund’ (1997) 9 International Environmental Affairs 179.
Boisson de Chazournes, L., ‘La mise en œuvre du droit international dans le domaine de
 la protection de l’environnement: Enjeux et défis’ (1995) Revue générale de droit
 international public 37.

‘Le Fonds pour l’environnement mondial: Recherche et conquête de son identité’
 (1995) 41 Annuaire français de droit international 612.

‘Technical and Financial Assistance’, in D. Bodansky, J. Brunnée and E. Hey (eds.),
 The Oxford Handbook of International Environmental Law (Oxford University
 Press, 2007), pp. 948-72.

Brown Weiss, E. and H. K. Jacobson (eds.), Engaging Countries: Strengthening
 Compliance with International Environmental Accords (Cambridge MA: MIT
 Press, 1998).

Brunnée, J., ‘COPing with Consent: Law-making under Multilateral Environmental
 Agreements’ (2002) 15 Leiden Journal of International Law 1.

Chayes, A. and A. Handler Chayes, The New Sovereignty, Compliance with
 International Regulatory Agreements (Cambridge MA: Harvard University Press,
 1998).

Correa, C., ‘Innovation and Technology Transfer of Environmentally Sound

Technologies: The Need to Engage in a Substantive Debate’ (2013) 22 Review of European, Comparative and International Law 54.

Diaz Anadon, L., ‘Missions-oriented RD&D Institutions in Energy Between 2000 and
 2010: A Comparative Analysis of China, the United Kingdom, and the United
 States’ (2012) 41 Research Policy 1742.

Fitzmaurice, M. and C. Redgwell, ‘Environmental Non-Compliance Procedures and
 International Law’ (2000) 31 Netherlands Yearbook of International Law 35.
Freeman, J. and C. Kolstad (eds.), Moving to Markets in Environmental Regulation.
 Lessons from Thirty Years of Experience (Oxford University Press, 2006).
Freestone, D., ‘The World Bank’s Prototype Carbon Fund: Mobilising new
 Resources for Sustainable Development’, in S. Schemmer-Schulte and K.-Y.
 Tung (eds.), Liber Amicorum Ibrahim S. I. Shihata (The Hague: Kluwer, 2001),
 pp. 265-341.

‘The World Bank and Sustainable Development’, in M. Fitzmaurice, D. Ong and

P. Merkouris (eds.), Research Handbook on International Environmental Law (Cheltenham: Edward Elgar, 2010), pp. 138-60.

Gündling, L., ‘Compliance Assistance in International Environmental Law: Capacity-
 Building, Transfer of Finance and Technology’ (1996) 56 Zeitschrift für
 ausländisches öffentliches Recht und Völkerrecht 796.

C:/ITOOLS/WMS/CUP-NEW/5963894/WORKINGFOLDER/DUPUY/9781107041240C09.3D 293 [270-294] 24.2.2015 3:45PM

293 Select bibliography

Handl, G., ‘Compliance Control Mechanisms and International Environmental

Obligations’ (1997) 9 Tulane Journal of International and Comparative Law 29.
Impériali, C. (ed.), L’effectivité du droit international de l’environnement. Contrôle de la
 mise en œuvre des conventions internationales (Paris: Economica, 1998).
Keller, W., ‘International Technology Diffusion’ (2004) 42 Journal of Economic
 Literature 752.

Kiss, A., D. Shelton and K. Ishibashi (eds.), Economic Globalization and Compliance
 with International Environmental Agreements (The Hague: Kluwer, 2003).
Kohona, P., ‘UNCED - The Transfer of Financial Resources to Developing Countries’
 (1992)1 Review of European Community and International Environmental Law 307. Koskenniemi, M., ‘Breach of Treaty or Non-Compliance? Reflections on the
 Enforcement of the Montreal Protocol’ (1992) 3 Yearbook of International
 Environmental Law 123.

Langer, M.-J., ‘Key Instruments of Private Environmental Finance: Funds, Project
 Finance and Market Mechanisms’, in P.-M. Dupuy and J. E. Viñuales (eds.),
 Harnessing Foreign Investment to Promote Environmental Protection: Incentives
 and Safeguards (Cambridge University Press, 2013), pp. 131-75.

Lawrence, P., ‘Technology Transfer Funds and the Law: Recent Amendments to the
 Montreal Protocol on Substances that Deplete the Ozone Layer’ (1992) 4 Journal of
 Environmental Law 15.

Maljean-Dubois, S., ‘Mécanismes internationaux de suivi et mise en œuvre des con-
 ventions internationales de protection de l’environnement’ (2004) 9 Analyses 1. Maskus, K. E., ‘Differentiated Intellectual Property Regimes for Environmental and
 Climate Technologies’, OECD Environment Working Papers, No. 17 (2010).
Miller, A. S., ‘The Global Environmental Facility and the Search for Financial
 Strategies to Foster Sustainable Development’ (1999-2000) 24 Vermont Law
 Review 1229.

Monk, A. H. B., ‘The Emerging Market for Intellectual Property: Drivers, Restrainers,
 and Implications’ (2009) 9 Journal of Economic Geography 469.

Nanda, N., ‘Diffusion of Climate Friendly Technologies: Can Compulsory Licensing
 Help?’ (2009) 14 Journal of Intellectual Property Rights 241.

Nollkaemper, A., ‘Compliance Control in International Environmental Law:

Traversing the Limits of the National Legal Order’ (2002) 13 Yearbook of International Environmental Law 165.

Ponce-Nava, D., ‘Capacity-Building in Environmental Law and Sustainable

Development’, in W. Lang (ed.), Sustainable Development and International Law (London: Springer, 1995), pp. 131-6.

Richardson, B. J., Socially Responsible Investment Law: Regulating the Unseen Polluters
 (Oxford University Press, 2008).

Romanin Jacur, F., The Dynamics of Multilateral Environmental Agreements.
 Institutional Architectures and Law-Making Processes (Naples: Editoriale
 Scientifica, 2013).

Schalatek, L. and S. Nakhooda, ‘The Green Climate Fund’, in Climate Finance

Fundamentals, No. 11, November 2012.

Steenblink, R. and J. A. Kim, ‘Facilitating Trade in Selected Climate Change Mitigation
 Technologies in the Energy Supply, Buildings, and Industry Sectors’, OECD Trade
 and Environment Working Paper, No. 2009-02 (4 May 2009).

C:/ITOOLS/WMS/CUP-NEW/5963894/WORKINGFOLDER/DUPUY/9781107041240C09.3D 294 [270-294] 24.2.2015 3:45PM

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Streck, C., ‘The Global Environmental Facility - A Role Model for International
 Environmental Governance?’ (2001) 1 Global Environmental Politics 71.
Treves, T., L. Pineschi, A. Tanzi, C. Pitea, C. Ragni and F. Romanin Jacur (eds.), Non-
 Compliance Procedures and Mechanisms and the Effectiveness of International
 Environmental Agreements (The Hague: TMC Asser Press, 2009).
 Ulfstein, G. and T. Marauhn (eds.), Making Treaties Work: Human Rights, Environment
 and Arms Control (Cambridge University Press, 2007).

United Nations Environment Programme, Manual on Compliance with
 and Enforcement of Multilateral Environmental Agreements (Nairobi:
 UNEP, 2006).

Urbinati, S., Les mécanismes de contrôle et de suivi des conventions internationales de
 protection de l’environnement (Milan: Giuffrè, 2009).

Viñuales, J. E., ‘Managing Abidance by Standards for the Protection of the

Environment’, in A. Cassese (ed.), Realizing Utopia (Oxford University Press, 2012), pp. 326-39.

Wolfrum, R., P. T. Stoll and U. Beyerlin (eds.), Ensuring Compliance with Multilateral
 Environmental Agreements. A Dialogue between Practitioners and Academia (The
 Hague: Martinus Nijhoff, 2006).