

Chapter 3

Adopting and Adapting Arbitration for Climate Change-Related Disputes

The Experience of the Permanent Court of Arbitration

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➤ Introduction

Essentially, “what is at stake with this climate conference, is peace.” *Oui, ce qui est en cause avec cette conférence sur le climat, c’est la paix.*¹ Those were the words of French President François Hollande at the Leaders’ Event in Paris opening COP21, the 21st meeting of the Conference of Parties to the UNFCCC.² In a similar vein, the International Bar Association Task Force on Climate Change Justice and Human Rights recognized in its 2014 Report (“IBA Report”) that “climate change threatens global security and territorial sovereignty.”³ More than five years ago, the UN Secretary General likewise warned the Security Council that “climate change is real” and “a threat to international peace and security.”⁴

Over 116 years ago, peace was also on the minds of world leaders at a multilateral gathering in Europe. That was the 1899 Hague Peace Conference, convened at the initiative of Tsar Nicholas II to discuss means to avert the impending threat of war. It resulted in a treaty, the 1899 Hague Convention for the Pacific Settlement of International Disputes, which recognized arbitration as the “most effective” and “equitable” means of settling legal disputes where diplomacy has failed and established the PCA to be “accessible at all times.”⁵ The 1899 Hague Convention defined the key features of arbitration as a way for parties to have their differences finally settled by decision makers “of their own choice,” “on the basis of respect for law” and in accordance with a procedure to be agreed amongst the parties.⁶ This ideal of peace through arbitration is depicted in the painting, *La Paix par l’arbitrage*, which was commissioned as a gift from France to the Peace Palace (the PCA’s headquarters in the Hague). The painting depicts two conflicting parties on horseback, their advocates addressing an arbitrator, and the goddess of peace emerging in the foreground, prevailing as a result of this process.⁷

How did that ideal play out over the subsequent 116 years of peaceful dispute resolution at the PCA, and how is that connected to climate change? As shown in Figure 1 below, after an initial period of activity at the PCA, there was very low case activity during the two world wars, but in the last fifteen years the caseload has increased exponentially. That spike of activity can be traced in part to the fact that, as confirmed by the PCA’s Member States in the 1930s, the PCA’s mandate is not only to administer inter-state arbitrations, but also mixed arbitrations which may involve a combination of public and private interests and entities. Such mixed arbitrations may include investor state arbitration and contract disputes. More recently, as discussed below, the Member States also agreed to PCA administration of private-private disputes in certain cases involving natural resources and the environment, in recognition of the strong public policy interest in efficient dispute settlement of such cases.

Reflecting on the PCA’s experience, this chapter explores what scope there is for international arbitration further to be used in the realm of climate change. Part I of the chapter provides a snapshot of the PCA’s experience with international arbitration involving the environment and climate change. Part II sets out how that experience intersects with possible disputes that could arise under the UNFCCC framework, including the “Paris Agreement” which emerged from COP21 and opened for signature on 22 April 2016.⁸ Part III presents concrete examples of how arbitral procedures might be adapted in the future to account for special characteristics of climate change related disputes, through greater access, greater expertise and greater flexibility.

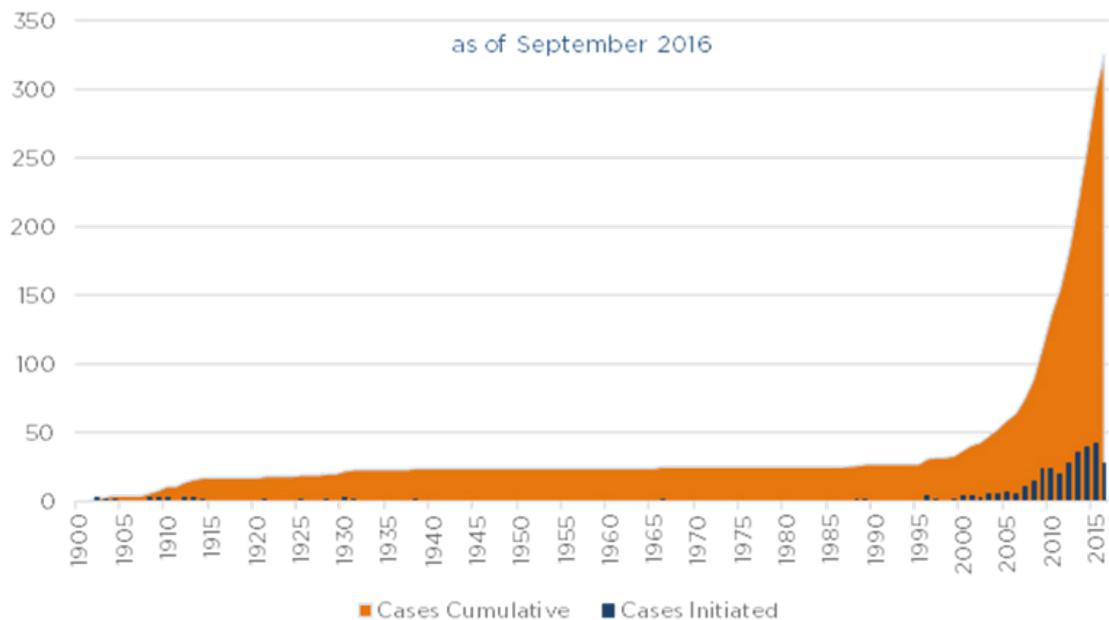


Figure 1. Cases Administered by the PCA, 1900-2015

As a preliminary point, it is important to bear in mind, as Roger Martella mentioned in his contribution at Chapter 3,⁹ that arbitration is just one part of the legal landscape for resolving climate change-related disputes. Potential avenues for dispute resolution might include national court litigation. An example is the test case brought against the government of the Netherlands on behalf of 900 Dutch citizens by the non-governmental organisation (“NGO”) Urgenda. Urgenda convinced the District Court of The Hague that the government has a legal obligation to do more to protect its people against the looming dangers of climate change and is obliged to take measures to cut the country’s greenhouse gas emissions by at least 25% by 2020.¹⁰ The press immediately predicted that the Dutch case could trigger similar claims against governments worldwide,¹¹ and indeed this has proven to be the case with similar actions contemplated or commenced in Belgium and Pakistan to name a few examples.¹² David Estrin, Co-Chair of the Task Force that produced the IBA Report, predicted in the context of sinking island States, that “litigation will be coming. There’s going to be billions of dollars on the table at some point.”¹³

In other legal contexts, NGOs and communities are taking action against energy companies. For example, as mentioned by Roger Martella, Greenpeace Southeast Asia recently commenced national Commission on Human Rights proceedings in the Philippines against fossil fuel companies in order to start an investigation, obtain recommendations and encourage policy action.¹⁴

A third new legal front that may open up is that of financial fraud investigations. The New York Times reported in November 2015 that the State Attorney General had begun investigating Exxon Mobil as to whether it lied to the public or its investors about the risks of climate change and how it might hurt the oil business.¹⁵ More recently this initiative has expanded to a coalition of 25 state attorneys general “committed to aggressively protecting and building upon the recent progress the United States has made in combatting climate change” and “seriously examining the potential of working together on high-impact, state-level initiatives, such as investigations into whether fossil fuel companies have misled investors about how climate change impacts their investments and business decisions.”¹⁶

International arbitration is distinct from such processes and offers unique advantages. As noted with respect to the 1899 Hague Convention, the hallmarks of international arbitration are (i) that it offers a procedure to which all parties consent to submit their dispute, (ii) for final and binding settlement, (iii) by neutral decisionmakers of the parties’ choice, (iv) who decide in accordance with law, and (v) who apply a procedure that is flexible to fit the needs of the parties and the particular dispute.

➤ PCA Cases with Environmental Issues

The PCA is currently administering 113 cases, over half of which relate to energy.¹⁷ Within each category of case that the PCA administers — inter-State, investor-State and contract-based disputes — issues of sustainable development and environmental law have been noticeably on the rise.

Inter-State Disputes

First, in the context of inter-State disputes, PCA cases have established or applied key principles of international sustainable development law. For example, in the *Iron Rhine Arbitration* which concerned the resumed use of a railway line, Belgium and the Netherlands consented to arbitration in the form of a special agreement. The Tribunal noted that treaties may be subject to a dynamic and “evolutive” interpretation in light of modern standards and changes to international environmental law. The case is significant for applying concepts of customary international environmental law to treaties concluded in the 19th century, when climate change and sustainable development were unheard of.¹⁸ In the *Kishenganga* case between Pakistan and India, consent to arbitration was contained in the Indus Waters Treaty of 1960. The dispute concerned the downstream environmental impact of the construction of a hydroelectric plant in the Kashmir area. The Tribunal referred to States’ international law obligations not to cause transboundary harm and “to manage natural resources in a sustainable manner.”¹⁹

Consent might also be in a multilateral treaty such as the United Convention on the Law of the Sea (“UNCLOS”).²⁰ Of the 13 PCA-administered cases under UNCLOS Annex VII, several have touched on sustainable development issues.²¹ For example, a case brought by the Netherlands against Russia concerned the arrest of the Greenpeace ship *Arctic Sunrise* during its protest over arctic drilling.²² The Chagos Marine Protected Area Arbitration concerned the establishment of a marine protected area in the Chagos Archipelago with a stated intention of, amongst other things, protecting marine life from the effects of climate change.²³ In *Bangladesh v India*, the tribunal was tasked with drawing a sea boundary in the Bay of Bengal, an area with highly unstable coastlines subject to the effects of sea level rise. The tribunal determined that if the coastline were to change in the future, this would not affect the allocation of maritime jurisdiction established by the Award, stating that:

Neither the prospect of climate change nor its possible effects can jeopardize the large number of settled maritime boundaries throughout the world. This applies equally to maritime boundaries agreed between States and to those established through international adjudication.²⁴

Investor-State Disputes

The PCA currently administers 71 cases between foreign investors and host States under bilateral and multilateral investment treaties, a growing number of which cases concern environmental law issues.²⁵ David Rivkin addresses the policy concerns raised in the environmental arena by investor State dispute settlement in Chapter 2.⁴⁷ The recent decision in *Bilcon v Canada*, under the North American Free Trade Agreement (“NAFTA”), concerned measures preventing the expansion of a quarry and illustrates the debate about the extent of States’ regulatory freedoms with respect to environmental protection.²⁷

Of greater relevance to the Paris climate change conference, the trend today towards investment in renewable and low-carbon energy industries has also given rise to a growing number of arbitrations at the PCA under the Energy Charter Treaty, NAFTA and BITs relating to solar, wind and hydropower investments.²⁸

It is not always States invoking environmental law norms and investors complaining about the impact of measures taken by States to protect the environment. In one PCA case, the claimant invested in a wildlife sanctuary and asserts that the State breached its international obligations by failing to enforce its domestic environmental legislation, causing pollution that effectively destroyed the investment.²⁹

Contract Disputes

The PCA also currently administers over 30 contract disputes involving a mix of private and public entities, most of which remain confidential.³⁰

The PCA has administered nine confidential contract based arbitrations connected with the Kyoto Protocol,³¹ relating to its Clean Development Mechanism (“CDM”) and Joint Implementation (“JI”) projects.³² Most of these were brought under the PCA’s Optional Rules for Arbitration of Disputes Relating to the Environment and/or Natural Resources (“PCA Environmental Rules”), which were adopted by the PCA in 2001.³³ As noted below, the PCA Environmental Rules feature in model clauses suggested by the International Emissions Trading Association.

Since many readers may be arbitration lawyers rather than climate specialists familiar with the concepts and acronyms associated with the COP, the following section sets out some basic explanations of the UNFCCC and the framework of its related agreements before identifying possible aspects of such architecture where arbitration could be used, or is already being embraced.

➤ Arbitrations and COP21

The UN Framework Convention on Climate Change, or UNFCCC, was signed in Rio in 1992.³⁴ It has been ratified by over 190 States, and it is a “framework convention”. That means it creates a structure under which future agreements may arise to implement action to achieve its overall objective. This overall objective is set out in Article 2: to stabilize global concentrations of greenhouse gas emissions at levels to “avoid dangerous climate change, allow ecosystems to adapt, and enable sustainable economic development.” To this end, in 1997 States signed the Kyoto Protocol.³⁵ The focus of Kyoto is on reducing the greenhouse gas emissions of developed country parties to the Convention (listed in Annex I of the Protocol). These emissions reductions were to be achieved during a series of commitment periods, the last of which expires in 2020.

Many accepted that the object of the UNFCCC would not be achieved by emissions reductions from developed countries alone and there was a need for a new system to be developed. Thus, the Paris Agreement moves away from the bifurcation between developed (Annex I) and developing (non-Annex I) countries and instead develops a system in which major emerging and developing economies also aim to reduce emissions, albeit with “common but differentiated responsibility”. All States Parties commit to the aim of holding the increase in global average temperature to well below 2°C above pre-industrial levels and to pursue efforts to limit the temperature increase to 1.5°C above pre-industrial levels.³⁶ The scope of the Paris Agreement also advances beyond the Kyoto Protocol, in that it focuses on more than just mitigation, as explained in more detail below.

Where does arbitration have a role to play in this framework? Disputes could arise in the context of the UNFCCC and its follow-up instruments at many different levels. An obvious starting point is the UNFCCC itself, Article 14 of which provides that if the States Parties dispute questions of the treaty’s interpretation or application, arbitration may be chosen as an appropriate form of dispute settlement. Article 14(1) allows Parties to settle the dispute through any means that they choose — which could include ad hoc arbitration. Article 14(2) provides expressly for arbitration as a form of dispute settlement and envisages that States Parties will agree on an annex for arbitration, which will set out the rules of procedure. The relevant text is as follows:

Article 14 Settlement of Disputes

1. In the event of a dispute between any two or more Parties concerning the interpretation or application of the Convention, the Parties concerned shall seek a settlement of the dispute through negotiation or **any other peaceful means of their own choice.** [*emphasis added*]
2. When ratifying, accepting, approving or acceding to the Convention, or at any time thereafter, a Party which is not a regional economic integration organization may declare in a written instrument submitted to the Depositary that, in respect of any dispute concerning the interpretation or application of the Convention, it recognizes as compulsory ipso facto and without special agreement, in relation to any Party accepting the same obligation:
 - a. Submission of the dispute to the International Court of Justice, and/or
 - b. **Arbitration in accordance with procedures to be adopted by the Conference of the Parties as soon as practicable, in an annex on arbitration.** [*emphasis added*]

A Party which is a regional economic integration organization may make a declaration with like effect in relation to arbitration in accordance with the procedures referred to in subparagraph (b) above.

The same provisions are mirrored in Article 24 of the Paris Agreement. The IBA report recommends that when setting out the arbitration rules in the Annex envisaged under Article 14(2), the “UNFCCC COP should adopt the PCA as the UNFCCC’s preferred arbitral body.”³⁷

Pending the adoption of such an annex, and prioritization of other aspects of the Paris Agreement, inter-State arbitration under the UNFCCC is not likely to arise in the short term. Of more practical relevance now, is how mixed arbitrations involving private parties and States might arise under the Kyoto Protocol and Paris Agreement.

Turning first to the Kyoto Protocol, the primary pillar is mitigation of greenhouse gas emissions. Under Article 3, each developed country State Party has an “Assigned Amount” of emissions reductions to achieve within a particular commitment period.³⁸ Each tonne of carbon emissions reductions is called an “Assigned Amount Unit” or “AAU”. The Kyoto Protocol creates a number of flexible mechanisms that allow countries that have spare AAUs (ie., that they have been allocated, but have not used) to sell them to countries that need extra AAUs.

One such flexible mechanism is the “Clean Development Mechanism”, or “CDM”, where a developed country agrees to fund a project in a developing country that will help reduce emissions, and in return the developed country gets credits (called Certified Emission Reduction credits, or “CERs”) for the carbon tonnage that might otherwise be emitted into the atmosphere.³⁹ The CERs can be used towards meeting the developed country’s Assigned Amount. CDM projects could include, for example, a hydroelectric plant being constructed instead of a coal plant. The project might be undertaken by private parties, who can then sell the credits on a private market.⁴⁰

The second method is “Joint Implementation” projects or “JI”s.⁴¹ This is a similar offsetting scheme to CDM projects except that it is done between developed countries listed in Annex I of the Kyoto Protocol. Similar development projects may be used in Joint Implementation, but the credits that are generated are called Emissions Reduction Units, or “ERUs”. ERUs are transferred to the sponsoring State so that it can use them to meet its Assigned Amount.

As noted above, cases involving both CDM and JI projects have already come to the PCA,⁴² including under arbitration clauses based on the International Emissions Trading Association’s Model Emissions Trading Agreements,⁴³ which suggest use of the PCA Environmental Rules. The PCA has also administered CDM disputes under arbitration clauses which refer to the UNCITRAL Rules arbitration.

As for the Paris Agreement, mitigation continues to be a key feature,⁴⁴ and received much attention during COP21 on the topic of States’ pledges of “Nationally Determined Contributions.” Trading mechanisms similar to those under the Kyoto Protocol, may also lead to legal arrangements featuring arbitration clauses.⁴⁵ So too will the novel mitigation mechanisms under the Paris Agreement, such as “REDD+” scheme, under which stakeholders will be incentivized to protect and preserve forests, which are important sinks for carbon dioxide.⁴⁶

Beyond mitigation, the Paris Agreement includes transparency provisions that will allow for monitoring of action by States towards complying with their “nationally determined contributions”.⁴⁷ It also deals with technology and capacity-building⁴⁸ and “adaptation” (Article 7), which refers to strategies (such as construction of sea walls) to reduce the vulnerability, particularly of developing countries, to the impacts of climate change.⁴⁹ A more controversial aspect of the Paris Agreement is loss and damage,⁵⁰ which is intended to deal with climate change impacts for which it is impossible to adapt, for example sea level rise or a severe natural disaster. Article 8 lists ways in which developed countries might assist climate-threatened developing countries, for example with funding and support of projects relating to early warning systems, energy preparedness, risk insurance facilities, and building resilience of communities, livelihoods and ecosystems. The accompanying decision text adopting the Paris Agreement however makes clear that nothing in Article 8 involves or provides “a basis for any liability or compensation.”⁵¹ Nevertheless, the web of cross-border legal relationships in projects that could sprout up in implementation of all these new provisions of the Paris Agreement might well entail the adoption of arbitration clauses as the preferred neutral, certain and binding means of resolving disputes.

This has already been seen in one other critical area of the Paris Agreement, namely finance,⁵² where there are tangible examples of climate change-related arbitration agreements. The primary finance body connected with the UNFCCC is the Green Climate Fund (“GCF”).⁵³ In short, a number of different legal instruments govern GCF-related financial flows. Examples include contribution agreements between States and GCF for transferring money to fund adaptation, mitigation and other climate change-related projects. The arbitration clause from Norway’s agreement to contribute 1.6 billion Krona, for example, provides for arbitration under the PCA’s 2012 Rules in Seoul, Korea (where the GCF is located).⁵⁴ The interim trustee arrangement between the GCF and the World Bank, acting as the Trustee, also contains an arbitration clause referring to the PCA.⁵⁵ The PCA’s Arbitration Rules are particularly useful under such arrangements because the PCA has experience administering disputes involving inter-governmental organizations and its Rules contain provisions for the special features of such disputes.⁵⁶ Finally, model arbitration clauses have also been suggested for the future arrangements governing the allocation of finance for the projects themselves.⁵⁷

In the future there may be similar legal instruments for development projects relating to adaptation and capacity building as well as for the transfer of technology. These instruments will be part of a new international climate change architecture for the future.

➤ Adapting Dispute Resolution for the Future

In light of the future role for arbitration under an emerging new international climate change architecture, how should arbitration adapt for climate change disputes in the future? This can be done through (a) greater accessibility, (b) greater expertise and (c) greater flexibility.

Greater accessibility

Greater accessibility may entail opening up of the arbitration process to non-state actors, increased transparency, and involving non-parties where appropriate. One case that illustrates some of these features is the *Abyei Arbitration*, a post-civil war intra-State dispute between a government (Sudan) and a non-state actor, a people’s liberation movement from within the same State.⁵⁸ After violence re-erupted in 2008, the parties agreed to refer their dispute over the oil-rich Abyei region to arbitration at the PCA. The arbitral proceedings were able to adapt to the tight timeframes set by the parties (one year),⁵⁹ their interest in transparency (with published pleadings and webcast

hearings) and tailored financial arrangements to avoid costs inhibiting a peaceful resolution (providing for access to the PCA's Financial Assistance Fund).⁶⁰

Another way in which arbitration is adapting to become more accessible is by giving non-parties a voice in proceedings. An example is the investment arbitration of *Eureko v Slovak Republic*, where the tribunal, with the consent of the parties, invited comments from the European Commission on issues of European law.⁶¹ It may be that a non-party itself applies to make an *amicus* submission, as has been done in recent cases administered by the PCA under the UNCITRAL Rules.⁶² Even when an *amicus* application fails, the non-party might have its voice heard as a witness, as with the Greenpeace activists who were called by the Netherlands in the *Arctic Sunrise* case.⁶³ Finally, nonparties might play a more passive role, such as observers. In the *Philippines v China* arbitration, which includes among many claims, alleged environmental destruction in the South China Sea, the Tribunal granted requests from seven interested States to observe the hearings and receive copies of pleadings.⁶⁴

Greater Expertise and Means to Improve Technical Understanding of Evidence

Through greater expertise, arbitration may adapt to the technical needs of climate change disputes, many of which involve technical scientific evidence. In the *Kishenganga* case, the treaty provided that one of the members of the tribunal would be a “highly qualified engineer” to be appointed by the rector of Imperial College London, in order to ensure the arbitral tribunal would understand and properly address issues concerning water flow.⁶⁵ In other PCA inter-State arbitrations, arbitral tribunals have retained independent technical experts to assist them in matters of hydrography, geography, archive access, ecology and maritime safety. The parties are given an opportunity to comment on the qualifications and terms of reference for the experts.⁶⁶

Site visits are another way in which tribunals may gain a better appreciation of the technical aspects of the evidence. The PCA 2012 Rules expressly contemplate site visits. In *Kishenganga*, the entire tribunal (or “court of arbitration” as it was known in that case), including its expert engineer member, conducted a site visit in Kashmir to inspect the water flow effects of the dam, and a smaller contingent (including the expert engineer member) conducted a second site visit during the winter season.⁶⁷ In *Guyana v Suriname*, the Tribunal appointed an independent technical expert to conduct a site visit in the presence of the parties and registry, and to report back on the results. Site visits were also organized by the PCA in *Bangladesh v India* for the tribunal to observe first-hand the tidal features and changing waters of the Bay of Bengal.⁶⁸ Site visits are suitable not only in inter-State disputes. The PCA has arranged them in more than one mixed arbitration, including in an investor-State arbitration in which the parties used the site visit as an opportunity to show the tribunal their positions on alleged environmental damage in a jungle area. That site visit was transcribed by a court reporter who invented his own jungle-ready, rain-and-mud-resistant, portable transcription equipment, epitomizing the adaptability required for arbitration of disputes involving complex technical issues and multiple stakeholders.

As recommended in the IBA Report, a further way to adapt arbitration to climate change disputes is for institutions to develop rules and expertise specific to the resolution of environmental disputes.⁶⁹ Indeed, the IBA Report acknowledges that the PCA has been a pioneer in this regard, having developed its PCA Environmental Rules back in 2001. The PCA Environmental Rules are procedural rules based on the UNCITRAL Arbitration Rules but modified to reflect the unique characteristics of disputes relating to natural resources, conservation or environmental protection. They establish a list of specialized arbitrators and a list of scientific and technical experts on the environment. Parties to a dispute are free to choose arbitrators, conciliators and experts from these Panels, but are not limited to those panels and may choose from outside the lists. The Rules contain model clauses that parties may include in treaties or other agreements for future or existing disputes relating to the environment and/or natural resources.⁷⁰

There has been uptake of the PCA Environmental Rules as mentioned above in Section I.B with respect to emissions trading contracts. In addition to the CDM and JI related disputes referred to there, the PCA Environmental Rules have been used in a commercial contract disputes involving Asian hydroelectric companies and a European company; and in a dispute involving a private party against a State entity in connection with a carbon emissions trading scheme, the details of which are confidential.

The PCA Environmental Rules are also referred to in multilateral treaties, including the 2003 Protocol on Civil Liability and Compensation for Damage Caused by the Transboundary Effects of Industrial Accidents on Transboundary Waters.⁷¹ The Rules have also been embraced in other initiatives including the Gold Standard Foundation, a body that provides a certification scheme for premium quality carbon credits generated by qualifying projects under the Kyoto Protocol's CDM and other carbon-trading schemes, which has included an adapted version of the PCA Environmental Rules in its process for appeals against certification decisions.⁷² Further, a private sector initiative known as “The Compact,” concerning liability issues arising out of the 1992

Convention on Biological Diversity, provides for binding arbitration between a State and a signatory company,⁷³ which also applies a modified version of the PCA Environmental Rules.⁷⁴

Greater Flexibility

The PCA has observed that greater flexibility in procedure, including ADR, is the subject of increased interest from parties.⁷⁵ For example, one case that started under the PCA's Environmental Rules was referred to (and successfully resolved under) conciliation under the PCA's Environmental Conciliation Rules.⁷⁶ In 2015, the PCA administered (within a few months and at low cost) a confidential conciliation under the UNCITRAL Conciliation Rules between an inter-governmental organization and a non-government organization relating to project funding.

In the context of business and human rights, an innovative mechanism in the wake of a disaster, designed to improve working conditions in the garment industry in Bangladesh, is the Accord on Fire and Building Safety in Bangladesh, signed by global clothing brands and trade unions in the wake of the Rana Plaza building collapse.⁷⁷ That Accord includes in paragraph 5, a dispute clause referring to UNCITRAL Rules. Another novel proposal to establish arbitral rules tailored to business and human rights disputes has also been published by an NGO, Lawyers for Better Business.⁷⁸ The proposal includes a roster of experts in human rights, a registry to administer the proposed arbitrations (they suggest the PCA), and a fund to lower the costs.⁷⁹

Finally, there is the possibility of review panels. In one PCA case, Russia initiated proceedings under a treaty based mechanism for reviewing a decision of the South Pacific Regional Fisheries Management Organization (SPRFMO), a body that allocates fish catch limits.⁸⁰ The PCA worked with the parties, including five States, one inter-governmental organization, and the fishing entity of Chinese Taipei, to tailor a procedure to the needs of the particular dispute. The dispute was resolved within six weeks, involved a fully transparent hearing conducted in four languages, and cost under €100,000. Russia has reportedly accepted the Review Panel's recommendation. This example is particularly pertinent for climate change in light of concerns over an "enforcement gap"⁸¹ and the treaty-based review mechanisms envisaged under the Paris Agreement.

> Conclusion

The new architecture for a green economy envisaged by the UNFCCC and its Paris Agreement has the scope for diverse and complex legal relationships amongst a mix of private and public stakeholders. Within those relationships, there is potential for the use of international arbitration and flexibly adapted dispute resolution mechanisms. However, climate change related arbitration is more than just an abstract future possibility. In the PCA's experience, it is already a reality.

> Notes

- * This speech was delivered at a side-event to COP21 jointly hosted by the International Bar Association (IBA), Permanent Court of Arbitration (PCA), ICC Court of International Arbitration, and the Stockholm Chamber of Commerce. The event took place during COP21, before the Paris Agreement was adopted in its final form. Where appropriate below, updated references are made to provisions of the final agreement. The author thanks Nicola Peart, former PCA Assistant Legal Counsel, for her assistance with preparing this speech, and contributing to the PCA's participation in COP21 and PCA Assistant Legal Counsel Sarah Castles for editorial assistance with this book chapter. A shorter published version of the speech was published in the June 2016 volume of the Australian Centre for International Commercial Arbitration's ACICA Review.
- 1. H.E. Mr. François Hollande, President of France, Opening of the Leaders Event, COP21, Paris, 30 November 2015, (video, 04:23) available at: <http://unfccc6.meta-fusion.com/cop21/events/2015-11-30-11-00-opening-of-the-leaders-event/h-e-mr-laurent-fabius-president-of-cop21-cmp11>; written remarks, http://unfccc.int/files/meetings/paris_nov_2015/application/pdf/cop21cmp11_statement_hollande.pdf.
- 2. *United Nations Framework Convention on Climate Change* 1771 UNTS 107 (signed 4 June 1992, entered into force 21 March 1994) ("UNFCCC").
- 3. International Bar Association, *Achieving Justice and Human Rights in an Era of Climate Disruption*, Climate Change Justice and Human Rights Task Force Report (July 2014), p. 88 ("IBA Report"), available at: <http://www.ibanet.org/PresidentialTaskForceClimateChangeJustice2014Report.aspx>.
- 4. *UN Secretary-General's remarks to the Security Council on the Impact of Climate Change on International Peace and Security*, New York, 20 July 2011, available at: <http://www.un.org/sg/STATEMENTS/index.asp?nid=5424>.
- 5. 1899 Hague Convention for the Pacific Settlement of International Disputes (opened for signature 29 July 1899, entered into force 4 September 1900), Articles 15, 16 ("1899 Hague Convention").
- 6. 1899 Hague Convention, Articles 20-29.
- 7. Paul-Albert Besnard, *La Paix et la Justice* (1914), oil on canvas. Peace Palace, The Hague, the Netherlands (based on *La Paix par l'arbitrage* (1912), oil on board. Musée d'Orsay, Paris, France, commissioned for Great Hall of Justice in the Peace Palace).
- 8. Paris Agreement (opened for signature 22 April 2016, not yet entered into force), available at: <https://unfccc.int/resource/docs/2015/cop21/eng/109.pdf>.
- 9. "Update on the IBA Task Force on Climate Change Justice and Human Rights", Roger Martella
- 10. See for example, *Stichting Urgenda v The Netherlands* (Hague District Court, 24 June 2015, case no. C/09/456689/HA ZA 13-1396, <http://deeplink.rechtspraak.nl/uitspraak?id=ECLI:NL:RBDHA:2015:7196> (appeal pending as at time of writing).
- 11. See, eg, *The Guardian* Article: "Hague Climate Change Judgement Could Inspire a Global Civil Movement" (24 June 2015), available at: <http://www.theguardian.com/environment/2015/jun/24/hague-climate-change-judgement-could-inspire-a-global-civil-movement>.
- 12. In April 2015, the founders of NGO Klimaatzaak commenced litigation against the Belgian Government, seeking a similar reduction of greenhouse gas emissions by 2020 (*VZW Klimaatzaak v Kingdom of Belgium, et al.*, (Court of First Instance, Brussels, Belgium, 2015) — for more information see <http://klimaatzaak.eu/nl/>.) Similar action was commenced in Pakistan: *Ashgar Leghariv Federation of Pakistan* (W.P. No. 25501/2015) (Lahore High Court Green Bench). Immediately after the Urgenda decision, an Australian public interest legal practice, Environmental Justice Australia, announced that it was "exploring legal strategies against the Australian government": see <https://envirojustice.org.au/stand-up-to-government-on-climate>.

13. *The Sydney Morning Herald* Article: "Warm Crimes: The Bid to Put 'Toxic Carbon in the Dock'" (24 June 2015), available at: <http://www.smh.com.au/environment/climate-change/warm-crimes-the-bid-to-put-toxic-carbon-in-the-dock-20150605-ghhmoz.html>.
14. Greenpeace Southeast Asia and Philippine Rural Reconstruction Movement, *Petition to the Commission on Human Rights of the Philippines Requesting for Investigation of the Responsibility of the Carbon Majors for Human Rights Violations or Threats of Violations Resulting from the Impacts of Climate Change*, available at: <http://www.greenpeace.org/seasia/ph/PageFiles/105904/Climate-Change-and-Human-Rights-Complaint.pdf>. [note for editors: cross-reference to Martella "Update on the IBA Task Force on Climate Change Justice and Human Rights"]
15. *The New York Times* Article: "Exxon Mobil Investigated for Possible Climate Change Lies by New York Attorney General" (5 November 2015), available at: http://www.nytimes.com/2015/11/06/science/exxon-mobil-under-investigation-in-new-york-over-climate-statements.html?_r=0.
16. See "A.G. Schneiderman, Former Vice President Al Gore And A Coalition Of Attorneys General From Across The Country Announce Historic State-Based Effort To Combat Climate Change," 29 March 2016, <http://www.ag.ny.gov/press-release/ag-schneiderman-former-vice-president-al-gore-and-coalition-attorneys-general-across>.
17. The number of cases was accurate as at May 2016. For remarks on PCA's work in the context of climate change related disputes, see generally the contribution of the PCA Secretary-General H.E. Mr. Hugo Hans Siblesz at the High Level Segment of COP21 on 8 December 2015 available at: <https://pca-cpa.org/wp-content/uploads/sites/175/2015/12/PCA-Press-Release-dated-8-December-2015.pdf>, as reported in <http://globalarbitrationreview.com/news/article/34424/pca-intervenes-cop21/>;
18. *Iron Rhine Arbitration (Belgium v Netherlands)*, Award of 20 September 2005, PCA Case No. 2003-02. See also PCA Award Series, *The Iron Rhine (Ijzeren Rijn) Arbitration (Belgium Netherlands) Award of 2005* (TMC Asser Press, 2007). Information about all PCA cases mentioned in this chapter is available at www.pca-cpa.org.
19. *Indus Waters Kishenganga Arbitration (Pakistan v India)*, Award of 20 December 2013, PCA Case No. 2011-01. See also PCA Award Series, *The Indus Waters Kishenganga Arbitration (Pakistan v India): Record of Proceedings 2010-2013* (PCA, 2014).
20. 1833 UNTS 3 (opened for signature 10 December 1982, entered into force 16 November 1994), dispute resolution provisions in Part XV. For a description of the PCA's involvement in UNCLOS Annex VII arbitrations see: <https://pca-cpa.org/en/services/arbitration-services/unclos/>.
21. For further details on the PCA's experience administering disputes under Annex VII of the 1982 UN Convention on the Law of the Sea, see PCA Contribution to the Secretary-General's Report on Oceans and the Law of the Sea to the 70th Session of the General Assembly, available online at http://www.un.org/depts/los/general_assembly_contributions70.htm.
22. *The Arctic Sunrise Arbitration (Netherlands v Russia)*, Award of 14 August 2015, PCA Case No. 2014-02.
23. *Chagos Marine Protected Area Arbitration (Mauritius v United Kingdom)*, Award of 18 March 2015, PCA Case No. 2011-3.
24. *The Bay of Bengal Maritime Boundary Arbitration (Bangladesh v India)*, Award of 7 July 2014, PCA Case No. 2010-16, para. 217.
25. The number of cases was accurate as at May 2016.
26. See Chapter 2, "IBA Task Force on Climate Change Justice and Human Rights".
27. *Bilcon of Delaware et al v Canada*, Award of 10 March 2015, PCA Case No. 2009-04.
28. Examples include *Antaris Solar GmbH (Germany) & Dr. Michael Göde (Germany) v The Czech Republic*, PCA Case No. 2014-01 (under the Germany-Czech and Slovak Federal Republic and the Energy Charter Treaty); *Guaracachi America Inc. (USA) & Rurelec plc (UK) v Plurinational State of Bolivia*, Award of 31 January 2014, PCA Case No. 2011-17 (under the BIT between the USA and Bolivia and the BIT between the UK and Bolivia); *Windstream Energy LLC (USA) v Canada*, PCA Case No. 2013-22 (under NAFTA); *Mesa Power Group LLC (USA) v Canada*, PCA Case No. 2012-17 (under NAFTA).
29. *Peter A. Allard (Canada) v Government of Barbados*, PCA Case No. 2012-06 (under the BIT between Canada and Barbados). For a general discussion about investor-state arbitration and environmental issues, see J. Viñuales "Foreign Investment and the Environment in International Law: The Current State of Play" in K. Miles (ed.), *Research Handbook on Environment and Investment Law* (Edward Elgar, forthcoming 2016); see also D. Rivkin, S. Lamb and N. Leslie "The Future of Investor-state Dispute Settlement in the Energy Sector: Engaging with Climate Change, Human Rights and the Rule of Law" (2015) 8(2) *Journal of World Energy Law and Business*, pp. 130-153.
30. For a list of disputes as to which the parties have authorized the PCA to disclose information, see www.pccases.com.
31. Kyoto Protocol to the United Nations Framework Convention on Climate Change, UN Doc. FCCC/CP/1997/7/Add.1 (opened for signature 16 March 1998, entered into force 16 February 2005), Articles 4, 12 ("Kyoto Protocol").
32. These include under the PCA's Environmental Rules a CDM dispute in 2015, disputes about Emissions Reductions Units (ERUs) (one in 2014, two in 2013 and one in 2009), and a JI related dispute in 2009. Also relevant are three CDM disputes under the UNCITRAL Arbitration Rules (one in 2010, two in 2014).
33. Available at: <https://pca-cpa.org/wp-content/uploads/sites/175/2016/01/Optional-Rules-for-Arbitration-of-Disputes-Relating-to-the-Environment-and-or-Natural-Resources.pdf>. For a discussion about the background to the PCA Environmental Rules, see Dane P. Ratliff "The PCA Optional Rules for Arbitration of Disputes Relating to Natural Resources and/or the Environment" (2001) *Leiden Journal of International Law*, 14, pp 887-896.
34. 1771 UNTS 107 (opened for signature 4 June 1992, entered into force 21 March 1994).
35. While "COP" refers to the "Conference of Parties" to the UNFCCC, and "COP21" refers to the 21st time the Conference of Parties have met, the equivalent body for the Kyoto Protocol is the "Conference of the Parties serving as the meeting of the Parties to the Kyoto Protocol" or "CMP", and Paris was its 11th session, thus the reference to "CMP 11" in the Paris Climate Conference logo.
36. Paris Agreement, Article 2(a).
37. IBA Report, pp. 13, 28, 139-144.
38. Kyoto Protocol, Article 3.
39. Kyoto Protocol, Article 12.
40. Kyoto Protocol, Article 12(9).
41. Kyoto Protocol, Article 6.
42. For more on disputes arising under the Kyoto Protocol, see C. Brown "International, Mixed, and Private Disputes Arising Under the Kyoto Protocol" (2010) 1(2) *Journal of International Dispute Settlement*, pp. 447-473; see also K. Miles, "Arbitrating Climate Change: Regulatory Regimes and Investor-state Disputes" (2010) 1 *Climate Law*, pp. 63-92.
43. International Emissions Trading Association, <http://www.ieta.org/>. Model agreements available at: <http://www.ieta.org/Trading-Documents>. See for example, Model Emissions Reductions Purchase Agreement v 3.0, "Code of CDM Terms" v1, Article 7.2 ("The Parties agree that any Dispute... is to be resolved by final and binding arbitration in accordance with the applicable rules of ... The [PCA] "Optional Rules for Arbitration of Disputes Relating to Natural Resources and/or the Environment"; see also Model Emissions Trading Agreement (EU ETS) v 5.0, Article 10.1 ("Any dispute arising under, out of or in connection with this Agreement shall be resolved by arbitration. ... [T]he applicable rules of arbitration shall be [*insert detail (eg the Optional Rules for Arbitration of Disputes Relating to Natural Resources and/or the Environment of the Permanent Court of Arbitration)").
44. Paris Agreement, (opened for signature 22 April 2016, not yet entered into force), Articles 3 and 4 ("Paris Agreement").
45. See Paris Agreement, Arts. 3, 4 and 6.
46. Reduced Emissions from Deforestation and land Degradation ("REDD+"), <http://www.un-redd.org/aboutredd>.
47. See Paris Agreement, Article 4(8) and (13), and transparency framework in Article 13 of the Agreement. See Chapter 4, "Update on the IBA Task Force on Climate Change Justice and Human Rights", See Chapter 2, "IBA Task Force on Climate Change Justice and Human Rights"
48. Paris Agreement, Articles 10-11.
49. Paris Agreement, Article 7.
50. Paris Agreement, Article 8.
51. Item 52 of the "Paris Decision" (the accompanying document by which the States passed the Paris Agreement).

52. Paris Agreement, Article 9. See also item 115 of Paris decision accompanying Paris Agreement, which resolved to “enhance the provision of urgent and adequate finance” and strongly urged developed country Parties “to scale up their level of financial support, with a concrete roadmap to achieve the goal of jointly providing USD 100 billion annually by 2020 for mitigation and adaptation while significantly increasing adaptation finance from current levels and to further provide appropriate technology and capacity-building support.”
53. See Chapter 9, “Green Climate Fund and its Role in Promoting and Funding Sustainable Investment”.
54. *Trust Fund Contribution Agreement among the Norwegian Ministry of Foreign Affairs, the Green Climate Fund, and the International Bank for Reconstruction and Development, serving as the interim trustee of the Green Climate Fund Trust Fund concerning the Green Climate Fund Trust Fund* (MTO No. 069022), Article 9 (“Any dispute, controversy or claim between the Fund and the Contributor arising out of or relating to this Contribution Agreement, which has not been settled pursuant to paragraph 9.1 of the Standard Provisions, shall be submitted to arbitration in accordance with the Arbitration Rules 2012 of the Permanent Court of Arbitration in force on the date hereof, and the following provisions: (a) the number of arbitrators shall be three (3); (b) the place of arbitration shall be Seoul, Republic of Korea; and (c) the language of the arbitral proceedings shall be English. Any arbitral award shall be final and binding upon the Fund and the Contributor. The Fund and the Contributor shall carry out the award without delay. The provisions set forth in this paragraph 9 shall be in lieu of any other procedure for the settlement of disputes between the Fund and the Contributor.”).
55. Section 10.2 makes the Secretary-General of the PCA the appointing authority for arbitration of disputes arising under the “Interim Trustee Arrangement.” See www.greencimate.fund/home.
56. PCA 2012 Arbitration Rules, available at: <https://pca-cpa.org/wp-content/uploads/sites/175/2015/11/PCA-Arbitration-Rules-2012.pdf>. See generally Brooks Daly, Evgeniya Goriatcheva, Hugh Meighen, “A Guide to the PCA Arbitration Rules (OUP, 2014).
57. See Section 18.01 of Standard Conditions for Readiness and Preparatory Support Grants (“... Any dispute... shall be referred to and finally resolved by arbitration in accordance with the [PCA] Arbitrations Rules 2012”).
58. *Abyei Arbitration (Government of Sudan v The Sudan People’s Liberation movement/Army)*, Final Award of 22 July 2009, PCA Case No. 2008-07. See also PCA Award Series, *The Abyei Arbitration (The Government of Sudan / The Sudan People’s Liberation Movement/Army): Final Award of 2009* (PCA, 2012).
59. See Chapter 4, “Update on the IBA Task Force on Climate Change Justice and Human Rights”.
60. See B. Daly “The Abyei Arbitration: Procedural Aspects of an Intra-state Border Arbitration” (2010) 23 *Leiden Journal of International Law*, pp. 801-823.
61. *Achmea B.V. (formerly known as “Eureka B.V.”) v Slovak Republic*, Award of 7 December 2012, PCA Case No. 2008-13. The tribunal also invited views from the Netherlands as party to the treaty, and state of the investor.
62. Discretion to allow *amicus* briefs has been held to be within the general powers over the conduct of proceedings in Art. 15 of the 1976 UNCITRAL Rules and Art. 18 of the 2010 UNCITRAL Rules (see also Art. 17 of 2012 PCA Rules). More recently rules have been drafted specifically to regulate *amicus* briefs. See, eg, ICSID Rules (2016), Rule 37; UNCITRAL Rules on Transparency in Treaty-based Investor-State Arbitration (2013) and UN Convention on Transparency in Treaty-based Investor-State Arbitration (2014).
63. *The Arctic Sunrise Arbitration (Netherlands v Russia)*, Award of 14 August 2015, PCA Case No. 2014-02.
64. *Philippines v China*, Award on Jurisdiction and Admissibility of 29 October 2015, PCA Case No. 2013-19, see, eg PCA Press Release No. 9 (30 November 2015).
65. The full arbitration clause is set out in an Annex to the Partial Award of 18 February 2013, available at <http://www.pcacases.com/web/sendAttach/1681>, p. A-33.
66. See, eg, *Guyanav Suriname*, Award of 17 September 2007, PCA Award Series at pp. 52-54, RIAA Vol. XXX, p. 1, at pp. 27-29, para. 108; *Barbados/Trinidad and Tobago*, Award of 11 April 2006, PCA Award Series at p. 33, RIAA Vol. XXVII p. 147 at p.160, para. 37.; *Bay of Bengal Maritime Boundary (Bangladesh v India)*, Award of 7 July 2014, paras. 15-17; *Philippines v China*, PCA Case No. 2013-19, Award of 29 October 2015.
67. See Press Releases of site visits at <http://www.pcacases.com/web/view/20>.
68. See Press Release of site visit at <https://pcacases.com/web/view/18>.
69. IBA Report, p. 14.
70. Model Clause for Future Disputes: “1. Any dispute, controversy, or claim arising out of or relating to the interpretation, application or performance of this agreement, including its existence, validity, or termination, shall be settled by final and binding arbitration in accordance with the Permanent Court of Arbitration Optional Rules for Arbitration of Disputes Relating to Natural Resources and/or the Environment, as in effect on the date of this agreement. The International Bureau of the Permanent Court of Arbitration shall serve as Registry for the proceedings.”; Model Clause for Existing Disputes: “1. The Parties agree to submit the following dispute to final and binding arbitration in accordance with the Permanent Court of Arbitration Optional Rules for Arbitration of Disputes Relating to Natural Resources and/or the Environment, as in effect on the date of this agreement: [insert brief description of dispute].” See also paper by Judith Levine on “Information about the Activities of the Permanent Court of Arbitration in Environmental Disputes in the Context of Energy Projects” prepared for the 1-2 September 2014 Copenhagen Conference on Arbitration of Energy Disputes: New Challenges, available at: http://voldgiftsinstitutet.dk/wp-content/uploads/2015/01/levine_-_pca_environment__26_energy_activities.pdf.
71. A list of such treaties appears on the PCA website at: <https://pca-cpa.org/en/services/arbitration-services/environmental-dispute-resolution/>
72. See Chapter 2 “IBA Task Force on Climate Change Justice and Human Rights”
73. See <http://www.biodiversitycompact.org>.
74. See further <https://pca-cpa.org/en/services/arbitration-services/environmental-dispute-resolution/>
75. See Chapter 11, “Balancing the State’s Duty to Protect the Environment with Its Obligations”, Former Senior Legal Advisor, United Nations Conference on Trade and Development (UNCTAD) who asked question about ADR]
76. PCA, *Optional Rules for Conciliation of Disputes Relating to Natural Resources and/or the Environment*, available at: https://pca-cpa.org/wp-content/uploads/sites/175/2016/01/Optional-Rules-for-Conciliation-of-Disputes-Relating-to-the-Environment-and_or-Natural-Resources.pdf.
77. *Accord on Fire and Building Safety in Bangladesh* (13 May 2013), available at: http://bangladeshaccord.org/wp-content/uploads/2013/10/the_accord.pdf.
78. C. Cronstedt and R. C. Thompson, *An International Arbitration Tribunal on Business and Human Rights* (Version 5, 13 April 2015), available at: <http://www.14bb.org/news/TribunalV5B.pdf>.
79. *Accord on Fire and Building Safety in Bangladesh* (13 May 2013), available at: http://bangladeshaccord.org/wp-content/uploads/2013/10/the_accord.pdf.
80. See S. Grimmer and N. Peart, “Pro Bono in International Proceedings at the Permanent Court of Arbitration,” (2015) 3 *Pro Bono Committee News: Newsletter of the International Bar Association Public and Professional Interest Division*, pp. 11-12.
81. See Chapter 1, “Introductory Remarks” and see Chapter 2, “IBA Task Force on Climate Change Justice and Human Rights”