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**INTERNATIONAL ADJUDICATORY FUNCTIONS: A COMPARATIVE
STUDY THROUGH THE LENS OF ENVIRONMENTAL CASES**

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ABSTRACT

This thesis asks how international adjudicators might discharge their functions given the demands of the contemporary international legal order and the limitations of their roles. In order to answer that question, the thesis uses the focus of environmental cases to analyse how adjudicators across four key sites of international adjudication manage the pressing problems of change, dispute resolution, and the standard and method of review, and why their practices differ. Addressing the question posed is important because international adjudication is in need of legal techniques which help meet contemporary demands, including by addressing concerns and potential shortcomings that have arisen with the increased adjudicatory activity of the past twenty years.

The adjudication settings focused upon – dispute settlement in the World Trade Organization (WTO) and the United Nations Convention on the Law of the Sea (UNCLOS), International Court of Justice (ICJ) litigation, and investment treaty arbitration – are the key fora of global reach where environmental cases are litigated. Environmental cases are used as a focus because they arise across international tribunals with markedly different design features and functional orientations and are thus representative of the diversity which characterises contemporary international adjudication. The thesis incorporates methodological insights from comparative law as the issue of comparative methodology has often been neglected in existing comparisons of different areas of international law.

The core argument the thesis develops is that international law needs adjudicators to adapt law incrementally, to enforce treaty disciplines, and to assist parties to resolve their disputes. However, the limitations on how international adjudicators might discharge their functions include both formal limitations, created by states as system designers, and practical limitations. Specifically, adjudicators often lack the legitimacy, specialist knowledge, or familiarity with local facts needed to engage in significant lawmaking, to weigh the relative importance of competing regulatory goals, or to fully dispose of a dispute.

The findings of my analysis contribute to debates concerning the diverse functions performed by contemporary adjudicators, the legitimacy of international adjudication, and the nature of international law-making. The thesis adds to understandings of the role

of adjudicators in incrementally adapting treaties. I explain why this is a key challenge, given international law's limited processes for law adjustment, and why it plays out differently across various contexts, particularly in investment treaty arbitration. The thesis extends existing debates regarding the standard and method of review, which largely focus on WTO and investment adjudication, by also analysing these problems in the ICJ and UNCLOS contexts. This part of my analysis highlights significant and underappreciated opportunities for comparatively informed learning.

The thesis extends existing debates regarding how adjudication might complement broader processes of dispute resolution involving post-adjudication negotiation or cooperation. I explain why, given relevant contextual features, adjudication in the WTO, UNCLOS and ICJ contexts often has a partly forward-looking and facilitative character, whereas investment arbitration has a largely retrospective and compensatory focus. I evaluate the potential for investment treaty arbitrators to adopt a more facilitative form of adjudication, which could assist the disputing parties to rebuild their relationship.

DECLARATION

This is to certify that:

- (i) the thesis comprises only my original work towards the PhD;
- (ii) due acknowledgement has been made in the text to all other material used; and
- (iii) the thesis is fewer than the maximum word limit in length, exclusive of tables, maps, bibliographies and appendices.

Joshua Paine

12 December 2016

PREFACE

A much earlier version of some of my arguments concerning investment treaty arbitration and the standard and method of review was published as Joshua Paine, 'The Project of System-Internal Reform in International Investment Law: An Appraisal' (2015) 6 *Journal of International Dispute Settlement* 332-354.

I am grateful for funding received at various points throughout my doctoral research from the University of Melbourne and Melbourne Law School, the Max Planck Institute for Comparative Public Law and International Law, the iCourts Centre University of Copenhagen, the Australian and New Zealand Society of International Law, and the Asia Pacific Centre for Military Law.

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I have also benefited from occasional exchanges with a wider group of scholars interested in similar topics, either at conferences, seminars, or via email. In particular, I wish to thank Jonathan Bonnitcha, Jeffrey Dunoff, Caroline Foster, Caroline Henckels, Jarrod Hepburn, Moshe Hirsch, Amokura Kawharu, Natalie Klein, Jürgen Kurtz, Luke Nottage, Jacqueline Peel, Stephan Schill, Tim Stephens, Gus Van Harten, and Armin von Bogdandy. Participating in relevant summer schools at the iCourts centre, University of Copenhagen, and at the University of Helsinki, was helpful to the development of my thesis. Similarly, auditing a masters-level course taught by Martti Koskeniemi allowed me to revisit in detail relevant parts of his work.

I have benefited from a friendly and supportive PhD cohort at Melbourne Law School, and, during my time as a visitor, at the Max Planck Institute in Heidelberg. While I cannot thank everyone in this group, I wish to acknowledge Adrian and Marie Aronsson-Storrier, Anne Carter, Madelaine Chiam, Martin Clark, Monique Cormier, Maria Elander, Anna Hood, Dylan Lino, Sophie Rigney, Elizabeth Sheargold, and Cait Storr.

On a personal note, I wish to thank my partner, Fiona, my parents, Bruce and Nicole, my sister, Laura, and my Aunt, Carrie, for the love and support they have provided throughout my academic pursuits. The thesis is dedicated to them.

ABBREVIATIONS USED IN TEXT

AB	Appellate Body
BIT	Bilateral Investment Treaty
CBD	Convention on Biological Diversity
CCAMLR	Convention for the Conservation of Antarctic Marine Living Resources
CETA	Comprehensive Economic and Trade Agreement between Canada and the European Union
Conc. and Diss. Op.	Concurring and Dissenting Opinion
Dec.	Declaration
Diss. Op.	Dissenting Opinion
DSB	Dispute Settlement Body
DSS	Dispute Settlement System
DSU	Dispute Settlement Understanding
EC	European Communities
EEZ	Exclusive Economic Zone
EIA	Environmental Impact Assessment
EU	European Union
FET	Fair and Equitable Treatment
FIT	Feed-In-Tariff
GATT	General Agreement on Tariffs and Trade
ICJ	International Court of Justice
ICSID	International Centre for Settlement of Investment Disputes
ICSID Convention	Convention on the Settlement of Investment Disputes between States and Nationals of Other States
ILC	International Law Commission
ITLOS	International Tribunal for the Law of the Sea
IUU fishing	Illegal, Unreported and Unregulated fishing
MFN	Most Favoured Nation
NAFTA	North American Free Trade Agreement
RTA	Regional Trade Agreement
Sep. Op.	Separate Opinion
SPS Agreement	Agreement on the Application of Sanitary and Phytosanitary Measures
TBT Agreement	Agreement on Technical Barriers to Trade
TPP	Trans-Pacific Partnership Agreement
UNCITRAL	United Nations Commission on International Trade Law
UNCLOS	United Nations Convention on the Law of the Sea
UNCTAD	United Nations Conference on Trade and Development
US	United States
VCLT	Vienna Convention on the Law of Treaties
Whaling Convention	International Convention for the Regulation of Whaling
WTO	World Trade Organization
WTO Agreement	Marrakesh Agreement Establishing the World Trade Organisation

ABBREVIATED JOURNAL TITLES

AJCL	American Journal of Comparative Law
AJIL	American Journal of International Law
Am Rev Int Arb	American Review of International Arbitration
Arb Int	Arbitration International
ASIL Proceedings	Proceedings of the Annual Meeting-American Society of International Law
Berkeley JIL	Berkeley Journal of International Law
Boston University LR	Boston University Law Review
Brigham Young ULR	Brigham Young University Law Review
BYBIL	British Yearbook of International Law
Calif LR	California Law Review
Calif WILJ	California Western International Law Journal
Chicago JIL	Chicago Journal of International Law
Chicago-Kent LR	Chicago-Kent Law Review
CJICL	Cambridge Journal of International and Comparative Law
Columbia JEL	Columbia Journal of Environmental Law
Columbia JTL	Columbia Journal of Transnational Law
Connecticut JIL	Connecticut Journal of International Law
Cornell ILJ	Cornell International Law Journal
CUP	Cambridge University Press
DJILP	Denver Journal of International Law and Policy
Ecology LQ	Ecology Law Quarterly
EJIL	European Journal of International Law
EJIR	European Journal of International Relations
EJLS	European Journal of Legal Studies
FYBIL	Finnish Yearbook of International Law
Georgetown JIL	Georgetown Journal of International Law
German LJ	German Law Journal
GWILR	George Washington International Law Review
HILJ	Harvard International Law Journal
ICLQ	International and Comparative Law Quarterly
ICON	International Journal of Constitutional Law
IJET	International Journal of Economic Theory
IJMCL	International Journal of Marine and Coastal Law
ILM	International Legal Materials
ILR	International Law Reports
JDIA	The Journal of Damages in International Arbitration
JEL	Journal of Environmental Law
JHIL	Journal of the History of International Law
JIDS	Journal of International Dispute Settlement
JIEL	Journal of International Economic Law
JITLP	Journal of International Trade Law and Policy
JWIT	Journal of World Investment and Trade
JWT	Journal of World Trade
LIEI	Legal Issues of Economic Integration

LJIL	Leiden Journal of International Law
Loy LA Int'l & Comp LR	Loyola of Los Angeles International & Comparative Law Review
LPICT	The Law and Practice of International Courts and Tribunals
Manchester JIEL	Manchester Journal of International Economic Law
Max Planck Ybk UN Law	Max Planck Yearbook of United Nations Law
Michigan JIL	Michigan Journal of International Law
MJ	Maastricht Journal of European and Comparative Law
MJIL	Melbourne Journal of International Law
NILR	Netherlands International Law Review
Nordic JIL	Nordic Journal of International Law
NYBIL	Netherlands Yearbook of International Law
NYUJILP	New York University Journal of International Law and Politics
NYURLSC	New York University Review of Law and Social Change
ODIL	Ocean Development and International Law
OJLS	Oxford Journal of Legal Studies
OUP	Oxford University Press
RBDI	Revue Belge de Droit International
RdC	Recueil de cours (Collected Courses of the Hague Academy of International Law)
RECIEL	Review of European Community and International Environmental Law
RIDC	Revue Internationale De Droit Comparé
Santa Clara JIL	Santa Clara Journal of International Law
Stanford ELJ	Stanford Environmental Law Journal
Stanford LR	Stanford Law Review
Temple LR	Temple Law Review
Tulane LR	Tulane Law Review
UC Davis JILP	UC Davis Journal of International Law and Policy
UNTS	United Nations Treaty Series
U Pa J Int'l L	University of Pennsylvania Journal of International Law
U Pa LR	University of Pennsylvania Law Review
Utah LR	Utah Law Review
UTLJ	University of Toronto Law Journal
Va JIL	Virginia Journal of International Law
WTR	World Trade Review
Ybk IEL	Yearbook of International Environmental Law
YJIL	Yale Journal of International Law
ZaöRV	Zeitschrift für ausländisches öffentliches Recht und Völkerrecht

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I. INTRODUCTION

A World Trade Organization (WTO) panel or the Appellate Body decides a dispute concerning an environmental measure which restricts international trade.¹ A dispute concerning marine environmental harm is brought before the International Tribunal for the Law of the Sea (ITLOS) or an arbitral tribunal under the United Nations Convention on the Law of the Sea (UNCLOS).² A dispute concerning environmental harm is brought before the International Court of Justice (ICJ) under a bilateral river treaty.³ A state's refusal of an environmental permit is challenged by a foreign investor before an arbitral tribunal under an investment treaty.⁴ In each case, the adjudicatory body is faced with a dispute where at least one of the parties is likely to claim to be acting to protect environmental interests. All of the bodies operate within distinct institutional contexts, and properly understanding their work requires careful analysis of numerous interrelated contextual factors. Yet the bodies are nonetheless likely to face, to a greater or lesser degree, a number of key problems confronting public international law adjudicators today: How do changes in international law, or changes in relevant facts, affect the tribunal's task of interpreting and applying obligations under the relevant treaty? How intensely should international adjudicators scrutinise determinations made by domestic officials who may have greater familiarity with local conditions, have applied specialist forms of expertise, or enjoy greater legitimacy? If international adjudicators are to balance partially competing interests, both protected to some degree by the relevant legal regime, should they utilise least restrictive means testing, full proportionality review, or some other legal test? Should adjudicators aim to completely dispose of the parties' dispute, or

¹ See eg *United States–Measures Concerning the Importation, Marketing and Sale of Tuna and Tuna Products–Report of the Appellate Body (Art 21.5)* (20 November 2015, Initial Report of the Appellate Body 16 May 2012) WT/DS381/AB/R; *European Communities–Measures Prohibiting the Importation and Marketing of Seal Products–Reports of the Appellate Body* (22 May 2014) WT/DS400/AB/R, WT/DS401/AB/R.

² See eg *Republic of the Philippines v People's Republic of China (Award)* (12 July 2016, and Award on Jurisdiction and Admissibility, 29 October 2015); *Case concerning Land Reclamation by Singapore in and around the Straits of Johor (Malaysia v Singapore)* (Provisional Measures, Order of 8 October 2003) ITLOS Reports 2003, 10; *MOX Plant (Ireland v United Kingdom)* (Provisional Measures, Order of 3 December 2001) ITLOS Reports 2001, 95.

³ See eg *Certain Activities carried out by Nicaragua in the Border Area (Costa Rica v Nicaragua)* and *Construction of a Road in Costa Rica along the San Juan River (Nicaragua v Costa Rica)* (Judgment, 16 December 2015, unpublished); *Pulp Mills on the River Uruguay (Argentina v Uruguay)* (Judgment) [2010] ICJ Rep 14; *Gabčíkovo-Nagymaros (Hungary/Slovakia)* (Judgment) [1997] ICJ Rep 7.

⁴ See eg *Crystallex International Corporation v Bolivarian Republic of Venezuela (Award)* (ICSID Case No. ARB(AF)/11/2, 4 April 2016); *Copper Mesa Mining Corporation v Republic of Ecuador (Award)* (PCA Case No. 2012-2, 15 March 2016); *William Ralph Clayton, William Richard Clayton, Douglas Clayton, Daniel Clayton and Bilcon of Delaware, Inc v Canada (Award on Jurisdiction and Liability)* (PCA Case No. 2009-04, 17 March 2015).

should they clarify key contested issues of law and fact but hand parts of the dispute back to the parties for further negotiation or cooperation?

This thesis seeks to address the question of how international adjudicators might discharge their functions given the demands of the contemporary international legal order and the limitations of their roles. In order to answer that question, the thesis uses the focus of environmental cases to analyse how adjudicators across the WTO, UNCLOS, ICJ, and investment treaty contexts manage the pressing problems of change, review of state conduct, and dispute resolution, and why their practices differ. In light of that analysis, the core argument the thesis develops is that international law needs adjudicators to adapt law incrementally, to enforce treaty disciplines, and to assist parties to resolve their disputes. However, the limitations on how international adjudicators might discharge their functions include both formal limitations, created by states as system designers, and practical limitations. For example, adjudicators often lack the legitimacy, specialist forms of knowledge, or familiarity with local facts needed to engage in significant lawmaking, to weigh the relative importance of competing regulatory goals, or to fully dispose of a dispute.

Addressing how adjudicators might discharge their functions given the limitations of their roles is important because international adjudication is at a crossroads. International adjudication has become increasingly central to some areas of international law and international relations over the past two decades.⁵ International adjudicators are frequently asked to determine how states' treaty obligations are affected by changes in wider international law or relevant facts, or to determine the legality of domestic regulatory measures which are based on specialised forms of expertise and strike a contestable balance between competing values. However, substantial concerns have arisen about the desirability of 'court-based governance of international relations'⁶ in light of its operation to date. Many have raised concerns over the legitimacy of the significant power exercised by international adjudicators through their development of legal

⁵ Yuval Shany, 'No Longer a Weak Department of Power? Reflections on the Emergence of a New International Judiciary' (2009) 20 EJIL 73, 75–76, 83–84; Benedict Kingsbury, 'International Courts: Uneven Judicialisation in Global Order' in James Crawford and Martti Koskenniemi (eds), *The Cambridge Companion to International Law* (CUP 2012) 210–212; Karen J Alter, *The New Terrain of International Law: Courts, Politics, Rights* (Princeton University Press 2014) 3–4.

⁶ Yuval Shany, *Assessing the Effectiveness of International Courts* (OUP 2014) 3.

principles which shape the rights and obligations of actors far beyond the disputing parties.⁷ For example, adjudicators' decisions may restrict the policy options of states who were not parties to a case.⁸ Another prominent concern is that adjudicators embedded within particular regimes – as most contemporary international adjudicators are – may promote certain values, specific to their own regime, to the exclusion of other concerns.⁹ Others have raised the important question of whether more flexible modes of dispute resolution, such as negotiation, may be better suited to resolving some of the disputes coming before international adjudicators.¹⁰

International adjudicators continue to be presented with a large number of disputes across a variety of institutional contexts. Contemporary adjudicators are, on the whole, acutely sensitive to broader concerns surrounding their work and often seek to address such concerns in their judgments.¹¹ Thus, a crucial challenge which faces international adjudication is to develop legal doctrines and techniques which meet the demands posed by the contemporary legal order, including by addressing concerns and potential shortcomings that have arisen from the increased adjudicatory activity of recent decades.¹²

The more specific contributions made by this thesis to the question of how international adjudicators might discharge their functions can be summarised relatively briefly. First this thesis adds to our understanding of the important role played by adjudicators in incrementally adapting treaty obligations given changes in wider international law or

⁷ See eg Nienke Grossman, 'The Normative Legitimacy of International Courts' (2013) 86 Temple LR 61, 68-73; Armin von Bogdandy and Ingo Venzke, *In Whose Name? A Public Law Theory of International Adjudication* (OUP 2014) 106-108, 112-119.

⁸ Benedict Kingsbury and Stephan Schill, 'Investor-State Arbitration as Governance: Fair and Equitable Treatment, Proportionality and the Emerging Global Administrative Law' in Albert Jan van den Berg (ed), *50 Years of the New York Convention* (Kluwer Law International 2009) 5-6, 23-26.

⁹ See eg von Bogdandy and Venzke (n 7) 134-5; Andreas Paulus, 'International Adjudication' in Samantha Besson and John Tasioulas (eds), *The Philosophy of International Law* (OUP 2010) 214-5; Where this study uses the term 'regime' I understand this to mean 'sets of norms, decision-making procedures and organisations coalescing around functional issue-areas and dominated by particular modes of behaviour, assumptions and biases': Margaret A Young, 'Introduction: The Productive Friction between Regimes' in Margaret A Young (ed), *Regime Interaction in International Law: Facing Fragmentation* (CUP 2012) 11 (developing this useful hybrid definition after reviewing, at 4-11, existing literature).

¹⁰ Vaughan Lowe, 'The Function of Litigation in International Society' (2012) 61 ICLQ 209, 220-222; Shany (n 5) 88-89.

¹¹ Andrew Lang, 'Twenty Years of the WTO Appellate Body's "fragmentation jurisprudence"' (2015) 14 JITLP 116, 120-121; Sivan Shlomo-Agon, 'Clearing the Smoke: The Legitimation of Judicial Power at the WTO' (2015) 49 JWT 539, 582-587. See also the investment awards analysed below Chapter VI(C)(1).

¹² Shany (n 5) 91.

relevant facts. Specifically, I explain why this is a key challenge for adjudicators, in the context of international law's limited processes for law adjustment, and why it plays out differently across the contexts studied. Second, in relation to the interrelated problems of the appropriate standard and method of review, which arise when determining whether states have complied with relevant treaty disciplines,¹³ this thesis extends existing debates which largely focus on WTO and investment treaty adjudication by also considering these problems in the ICJ and UNCLOS contexts. This part of my analysis highlights significant opportunities for comparatively informed learning. For example, I will demonstrate that a small number of functionally similar balancing techniques are utilised across the four contexts in scrutinising the legality of states' measures, and suggest that certain lessons emerge regarding how such techniques should be utilised. Third, the thesis adds to our understanding of how adjudicators can, through their pronouncements, contribute to broader processes of dispute resolution. Here, I build on an existing literature which has suggested that adjudicators can in some circumstances play a partly facilitative role by clarifying key contested legal issues and enabling the parties to resolve their dispute under the guidance of a judgment.

A related contribution made by this thesis is to analyse how adjudicators might discharge their functions given the varied contexts and constraints within which they operate. Contemporary international tribunals have markedly different design features, reflecting strategic choices made by the states who created them.¹⁴ Given the varied aims and jurisdictions of international tribunals, the constituencies to which they primarily answer differ in important respects.¹⁵ The control mechanisms which states can exercise over adjudicators, such as deciding upon (re)appointments to a tribunal or agreeing upon authoritative interpretations of a treaty,¹⁶ also differ in important ways across institutional

¹³ The terms standard and method of review are defined below: text at n 107-108, 115.

¹⁴ Jeffrey L Dunoff and Mark A Pollack, 'The Judicial Trilemma' (Manuscript of August 2016, on file) 2-3, 6; Andrew T Guzman, 'International Tribunals: A Rational Choice Analysis' (2008) 157 U Pa LR 171, 203; Eyal Benvenisti and George W Downs, 'The Empire's New Clothes: Political Economy and the Fragmentation of International Law' (2007) 60 Stanford LR 595, 597-8, 608-9 (rise of distinct tribunals and bodies of law is not accidental, but at least partly the result of deliberate strategic choices).

¹⁵ This point will be addressed in analysing the goals of each of the adjudication mechanisms studied, in section A of chapters III-VI; While international tribunals potentially serve a variety of constituencies, the states which create and sustain a tribunal are the most important constituency. Nevertheless, adjudicators are often expected to address the interests of other constituencies: Shany, *Effectiveness* (n 6) 32-36; For example, investment arbitrators have recognised the need to address the interests of investors and the wider public: see below ch VI, text at n 66-70.

¹⁶ Laurence R Helfer and Anne-Marie Slaughter, 'Why States Create International Tribunals: A Response to Professors Posner and Yoo' (2005) 93 Calif LR 899, 949-953.

settings. Our understanding of functions of international adjudicators, and how those functions might be discharged, must be sensitive to the marked variations which characterise contemporary international adjudication.

The context-sensitive analysis undertaken in this thesis will allow me to draw conclusions regarding the particular biases or orientations which animate legal work within the adjudication settings studied.¹⁷ For example, I will develop key claims that investment treaty arbitration exhibits a bias against change in regulatory systems of host states, and has a tendency towards a form of dispute resolution which is focused on retrospective compensation, rather than rebuilding the disputing parties' relationship. The analysis conducted will also allow me to draw out certain elements which are 'common and distinctive in the legalist's way of seeing [and responding to] international problems'.¹⁸ For example, I will suggest that across diverse contexts adjudicators frequently emphasise the comparatively greater knowledge and legitimacy of domestic decision-makers in choosing which regulatory aims to pursue, and selecting the means for doing so.

As will be explained in Chapter Two, this thesis partly reflects a functional approach to comparative law. Accordingly, I will develop hypotheses about the problems faced by international adjudicators and view adjudicators' decisions as potential responses to those problems.¹⁹ Much of my analysis will focus on the extent to which the problems faced, techniques utilised in response, and functions performed by adjudicators are comparable across the contexts studied.²⁰ The thesis builds on a recent body of scholarship which suggests that comparative law offers a potentially promising and underutilised approach for understanding variations between different international legal contexts²¹ reflecting

¹⁷ Martti Koskeniemi, *From Apology to Utopia: The Structure of International Legal Argument* (reissue, CUP 2005) 608-610 (regarding the idea of regimes having biases).

¹⁸ Ruti Teitel and Robert Howse, 'Cross-Judging: Tribunalization in a Fragmented but Interconnected Global Order' (2009) 41 NYUJILP 959, 966.

¹⁹ Ralf Michaels, 'The Functional Method of Comparative Law' in Mathias Reimann and Reinhard Zimmermann (eds), *The Oxford Handbook of Comparative Law* (OUP 2006) 342, 366.

²⁰ Ibid.

²¹ Valentina Vadi, 'Critical Comparisons: The Role of Comparative Law in Investment Treaty Arbitration' (2010) 39 DJILP 67; Valentina Vadi, *Analogies in International Investment Law and Arbitration* (CUP 2015); Mads Andenas and Duncan Fairgrieve, 'Courts and Comparative Law: In Search of a Common Language for Open Legal Systems' in Mads Andenas and Duncan Fairgrieve (eds), *Courts and Comparative Law* (OUP 2015) 4-5, 9-10; Benedikt Pirker, 'Interpreting Multi-Sourced Equivalent Norms: Judicial Borrowing in International Courts' in Yuval Shany and Tomer Broude (eds), *Multi-Sourced Equivalent Norms in International Law* (Hart Publishing 2011) 93, 96; David Kennedy, 'One, Two, Three, Many Legal Orders: Legal Pluralism and the Cosmopolitan Dream' (2007) 31 NYURLSC 641, 649-650; Martti Koskeniemi, 'The Case for Comparative International Law' (2011) 20 FYBIL 1, 5-7; For a recent

that it is a discipline aimed at identifying and explaining similarities and differences between legal systems.²² Much recent literature on international adjudication adopts an explicitly comparative perspective, seeking to draw out broader lessons and best practices concerning topics such as the standard and method of review,²³ or more procedural questions concerning the administration of justice.²⁴ This thesis shares with such approaches the underlying idea that comparative study can make one aware of comparable challenges faced, and potentially useful legal techniques developed, in other institutional contexts.²⁵ However, it is crucial to remember that even where international adjudicators appear to face similar problems or develop similar solutions, differences persist reflecting the varied contexts in which tribunals operate,²⁶ and the numerous interrelated factors which shape their work.²⁷ The challenge is partly one of managing ‘scale change’²⁸ and differentiating between levels of analysis because legal regimes often appear similar at one level of analysis and yet different at another level of analysis.²⁹

attempt to define the emerging field of ‘comparative international law’, with a focus on how international law is understood within different national and regional legal systems, rather than on variation between different subfields of international law see Anthea Roberts et al, ‘Comparative International Law: Framing the Field’ (2015) 109 AJIL 467, 469; Some comparative lawyers have emphasised the need to broaden their field beyond national legal systems to include the study of transnational regimes: Annelise Riles, ‘Wigmore’s Treasure Box: Comparative Law in the Era of Information’ (1999) 40 HILJ 221, 276; Mathias Reimann, ‘Beyond National Systems: A Comparative Law for the International Age’ (2000) 75 Tulane LR 1103, 1115–9.

²² David Kennedy, ‘New Approaches to Comparative Law: Comparativism and International Governance’ [1997] Utah LR 545, 546, 615–621; Jaakko Husa, *A New Introduction to Comparative Law* (Hart Publishing 2015) 147.

²³ Lukasz Gruszczynski and Wouter Werner (eds), *Deference in International Courts and Tribunals: Standard of Review and Margin of Appreciation* (OUP 2014); Caroline Henckels, *Proportionality and Deference in Investor-State Arbitration: Balancing Investment Protection and Regulatory Autonomy* (CUP 2015); Benedikt Pirker, *Proportionality Analysis and Models of Judicial Review: A Theoretical and Comparative Study* (Europa Law Publishing 2013).

²⁴ Chester Brown, *A Common Law of International Adjudication* (OUP 2007).

²⁵ William W Park and Thomas W Walsh, ‘Review Essay: The Uses of Comparative Arbitration Law’ (2008) 24 Arb Int 615, 615; Vadi, *Analogies* (n 21) 230; Andrea K Bjorklund and Sophie Nappert, ‘Beyond Fragmentation’ in Todd Weiler and Freya Baetens (eds), *New Directions in International Economic Law: In Memoriam Thomas Wälde* (Martinus Nijhoff Publishers 2011) 445.

²⁶ Similarly: Yuval Shany and Tomer Broude, ‘The International Law and Policy of Multi-Sourced Equivalent Norms’ in Shany and Broude (eds), *Multi-Sourced Equivalent Norms in International Law* (n 21) 5–6, 8–9 (suggesting norms which are similar or identical in their normative content, but established through different international instruments or processes and in different areas of international law, are never fully equal or identical, reflecting that they contain a core of equivalence but arise in different political and institutional contexts); *MOX (ITLOS)* (n 2) [51]; Jonathan I Charney, ‘Is International Law Threatened by Multiple International Tribunals?’ (1998) 271 RdC 101, 137.

²⁷ Dunoff and Pollack (n 14) 3–4; The importance of such contextual factors will be discussed further below in explaining the comparative methodology employed: Ch II, text at n 89–91.

²⁸ Riles (n 21) 225, 240, 252–3 (on the appropriate scale for analysis, and managing scale change, as a fundamental problem in comparativism).

²⁹ Michaels (n 19) 368.

For several reasons the category of environmental cases provides an ideal lens for the comparative study just described. Environmental disputes lack a devoted international tribunal and are adjudicated through a variety of ‘borrowed’ fora³⁰ with diverse design features and functional orientations. A substantial number of environmental cases have been litigated in each of the adjudication settings studied and no one institution or professional community has dominated such cases.³¹ Accordingly, this category of cases is representative of the sectorial and decentralised nature of contemporary international adjudication,³² and the familiarity with multiple subsystems of international law which this demands of international lawyers as a condition of their professional competence.³³ Environmental cases highlight the problem of how to respond to legal or factual change because they often require adjudicators to interpret legal rules agreed at an earlier point – when environmental norms were less well developed – in new ways,³⁴ and because the application of legal norms often depends on facts which are prone to change, such as scientific knowledge or technical capacity.³⁵ Environmental disputes also pose acutely the question of how intensely international adjudicators should scrutinise national-level determinations which may have involved the application of specialist forms of expertise, an assessment of local circumstances, or the exercise of discretion over value-laden matters. Thus this category of cases foregrounds the problem of the appropriate standard of international adjudicatory review given the comparatively greater knowledge or legitimacy of domestic authorities. As environmental disputes typically involve competing economic and ecological interests, they also pose acutely the question of which legal techniques international adjudicators might use to balance partially competing interests, and whether adjudicators should assess the relative importance of

³⁰ Pierre-Marie Dupuy and Jorge E Viñuales, *International Environmental Law* (CUP 2015) 247.

³¹ Alan Boyle, ‘The Environmental Jurisprudence of the International Tribunal for the Law of the Sea’ (2007) 22 *IJMC* 369, 372; James Harrison, ‘Reflections on the Role of International Courts and Tribunals in the Settlement of Environmental Disputes and the Development of International Environmental Law’ (2013) 25 *JEL* 501, 502–3.

³² Ellen Hey, *Reflections on an International Environmental Court* (Kluwer Law International 2000) 24.

³³ Suzannah Linton and Firew Kebede Tiba, ‘The International Judge in an Age of Multiple International Courts and Tribunals’ (2008) 9 *Chicago JIL* 407, 464 (international lawyers need ‘to be as versatile as Swiss Army knives in terms of their knowledge of the various subsystems of international law’); Koskenniemi, ‘Case for Comparative’ (n 21) 6–7 (suggesting contemporary international lawyers need expertise in multiple regimes); Regarding the concept of professional competence in international law see Koskenniemi, *From Apology to Utopia* (n 17) 566–69.

³⁴ Anna Spain, ‘Beyond Adjudication: Resolving International Resource Disputes in an Era of Climate Change’ (2011) 30 *Stanford ELJ* 343, 362.

³⁵ Malgosia Fitzmaurice, ‘Equipping the Court to Deal with Developing Areas of International Law: Environmental Law’ in Connie Peck and Roy S Lee (eds), *Increasing the Effectiveness of the International Court of Justice: Proceedings of the ICJ/UNITAR Colloquium to Celebrate the 50th Anniversary of the Court* (M Nijhoff Publishers 1997) 399, 415–6.

various regulatory aims. Finally, environmental cases have repeatedly raised the question of whether it is appropriate for international adjudicators to decide disputes with a partly prospective focus, and, for example, order the parties to cooperate in conducting further environmental monitoring.

The adjudication settings covered by this thesis – dispute settlement in the WTO and the UNCLOS, ICJ litigation, and investment treaty arbitration – have been selected because they are the key adjudicatory fora of global reach where environmental cases have been repeatedly litigated. Chapter Two, which justifies the methodology of this study, explains in detail why these adjudicatory fora are focused on and how an environmental case has been defined. The remainder of this introduction proceeds as follows. Section A situates this thesis in relation to two existing debates in international legal scholarship which have provoked the question posed. First, it is necessary to situate this thesis within debates concerning the functions of international adjudicators, as this is the primary set of existing debates to which I seek to contribute. Second, it is necessary to briefly explain how my inquiry relates to well-established debates concerning the fragmentation of international law, which constitute an important part of the background to my analysis. Section B then provides an overview of my argument in the chapters to follow.

A. Contemporary Debates in International Legal Scholarship

1. Situating this Thesis within Debates on the Functions of International Adjudicators

In analysing how three pressing problems are managed by adjudicators across the four contexts studied this thesis seeks to make claims about the functions that adjudicators are performing. By ‘functions’ I mean the roles played by international adjudicators in deciding cases, or what they are doing,³⁶ and how their decisions serve particular ends or purposes,³⁷ as one part of the broader and highly diverse international legal order.³⁸

³⁶ Lowe (n 10) 211.

³⁷ Stephan Wittich, ‘The Judicial Functions of the International Court of Justice’ in Isabelle Buffard et al (eds), *International Law between Universalism and Fragmentation: Festschrift in Honour of Gerhard Hafner* (Martinus Nijhoff Publishers 2008) 985–6; Shany, *Effectiveness* (n 6) 31–49 (analysis based on the idea that international tribunals are designed to pursue different goals); José E Alvarez, ‘What Are International Judges for? The Main Functions of International Adjudication’ in Cesare PR Romano, Karen J Alter and Yuval Shany (eds), *The Oxford Handbook of International Adjudication* (OUP 2014) 159–160, 176–177 (analysing the functions of international adjudication taking account of the goals of stakeholders and what adjudicators see themselves as doing).

³⁸ von Bogdandy and Venzke (n 7) 5, 7; Brown (n 24) 72–78 (similarly suggesting a variety of functions or purposes are served by international tribunals); Typically the ends served by adjudicatory decisions will be

Thinking in terms of the functions of international adjudicators is useful because international tribunals are designed with different purposes which must be analysed in an institution-specific manner,³⁹ and a tribunal's specific functions, established by relevant constituent instruments, are an important influence on how adjudicators perform their tasks.⁴⁰ Furthermore, the decisions of international adjudicators are typically multifunctional in that a single decision often has 'a series of legal and social consequences that one can regard as functions',⁴¹ which are distinct yet overlapping, frequently in tension,⁴² and can usefully be analysed. There is an active literature which has expanded our understanding of a set of core or generic functions that most international tribunals perform, to differing degrees, in addition to specific functions that are unique to particular institutions.⁴³ Accordingly, it is important to explain where the aspects of contemporary adjudication focused on by this thesis fit within such wider debates.

A primary function of international tribunals is to settle the disputes presented to them in accordance with the applicable law.⁴⁴ This point finds support in the constituent instruments of the tribunals studied and their decisions. For example, under Article 38(1) of its Statute the function of the ICJ 'is to decide in accordance with international law such disputes as are submitted to it',⁴⁵ and it has repeatedly reaffirmed this task in its case law.⁴⁶ Likewise, WTO adjudicators have, drawing on a clear basis in the Dispute Settlement Understanding,⁴⁷ observed that the WTO dispute settlement system is 'first

more specific than, and make an incremental contribution to, the ultimately aims of a legal order: Lowe (n 10) 211.

³⁹ Shany, *Effectiveness* (n 6) 48; Wittich (n 37) 988; Dinah Shelton, 'Form, Function, and the Powers of International Courts' (2008) 9 *Chicago JIL* 537, 571.

⁴⁰ Wittich (n 37) 987; Alvarez (n 37) 177.

⁴¹ von Bogdandy and Venzke (n 7) 5, 7.

⁴² Wittich (n 37) 1000; But see Shelton (n 39) 539–40 (arguing there is always a dominant function at a given time).

⁴³ On the idea of generic functions: Shany, *Effectiveness* (n 6) 37–38; Alvarez (n 37) 160.

⁴⁴ Wittich (n 37) 987; Manley O Hudson, *International Tribunals: Past and Future* (Carnegie Endowment for International Peace 1944) 236.

⁴⁵ Statute of the International Court of Justice (1945) 33 UNTS 993, Art 38(1) ('ICJ Statute').

⁴⁶ *LaGrand (Germany v United States of America)* (Judgment) [2001] ICJ Rep 466, [52]; *Nuclear Tests (New Zealand v France)* (Judgment) [1974] ICJ Rep 457, [58], [60]; *Northern Cameroons (Cameroon v UK)* (Preliminary Objections) [1963] ICJ Rep 15, 33–4.

⁴⁷ Understanding on Rules and Procedures Governing the Settlement of Disputes, Marrakesh Agreement Establishing the World Trade Organisation, Annex 2 (1994) 1869 UNTS 401, Arts 3.3, 3.4, 3.7 ('DSU' and 'WTO Agreement').

and foremost ... designed to settle disputes'.⁴⁸ A traditional view sees the dispute settlement function as limited and private, whereby the task of adjudicators 'is "to do justice" between the litigant states, and to render a judgment or award which takes account of all relevant facts, which is limited to the *petitum* of the dispute, and which is made with final and binding force'.⁴⁹ This claim is still heard in the expression of consent-based concerns within international adjudication.⁵⁰ However, in the course of deciding disputes adjudicators typically perform, even if only incidentally,⁵¹ a variety of other, more public functions.⁵²

To begin with, even the dispute settlement function is not accurately characterised as being solely of a private and bilateral nature. The peaceful settlement of disputes serves a broader community interest beyond the disputing parties in preventing disputes escalating into violent conflict.⁵³ We see this basic idea, for example, when contemporary investment lawyers seek to rationalise investor-state dispute settlement as a rule-based alternative to gunboat diplomacy.⁵⁴ Adjudicators' decisions can encourage future dispute settlement or 'bargaining in the shadow' of such decisions, including by parties who were not involved in the original case.⁵⁵ Even for those settings that would most plausibly fit the bilateral, private dispute settlement characterisation, such as ICJ litigation or investment treaty arbitration, this characterisation is highly questionable given that adjudicators' decisions are followed in minute detail by a wider audience than the disputing parties and are influential sources for arguing in future, unrelated disputes.⁵⁶

⁴⁸ *European Communities–Regime for the Importation, Sale and Distribution of Bananas–Report of the Panel* (22 May 1997) WT/DS27/R/ECU, [7.32].

⁴⁹ Chester Brown, 'The Inherent Powers of International Courts and Tribunals' (2005) 76 BYBIL 195, 229–30.

⁵⁰ See eg *Romak S.A. (Switzerland) v The Republic of Uzbekistan (Award)*, (PCA Case No. AA280, 26 November 2009) [171] (Tribunal's task limited to resolving the dispute between the parties, and it had 'not been entrusted, by the Parties or otherwise, with a mission to ensure the coherence or development of "arbitral jurisprudence"').

⁵¹ Wittich (n 37) 987, 996; RY Jennings, 'The Judicial Function and the Rule of Law in International Relations', *Collected Writings of Sir Robert Jennings*, vol 1 (Kluwer Law International 1998) 483.

⁵² Brown (n 24) 72–78.

⁵³ Wittich (n 37) 990; Shany, *Effectiveness* (n 6) 42; Hudson (n 44) 237–8.

⁵⁴ Payam Akhavan et al, 'An Open Letter about Investor-State Dispute Settlement' (20 April 2015) <<https://www.mcgill.ca/fortier-chair/isds-open-letter>>.

⁵⁵ See generally Andrea K Schneider, 'Bargaining in the Shadow of (International) Law: What the Normalization of Adjudication in International Governance Regimes Means for Dispute Resolution' (2008) 41 NYUJILP 789; Spain (n 34).

⁵⁶ von Bogdandy and Venzke (n 7) 105–7, 209; See also the discussion of investment treaty arbitration as having multilateral effects, below Ch VI(A)(1).

A second key function served by international tribunals is that they act as ‘agents’ in the development of international law.⁵⁷ There are important differences between other types of law-making, such as concluding treaties or agreeing on authoritative interpretations, and the more constrained law-making in which adjudicators have an opportunity to engage.⁵⁸ In particular, adjudicators are reliant on a suitable case coming before them and there is a strong expectation that their decision will be related to existing legal materials and make use of recognised methods of legal reasoning.⁵⁹ The influence of their decisions is also dependent, to a greater degree than other forms of law-making, on how they are received in subsequent legal practice.⁶⁰ Despite these qualifications, international tribunals are bodies with immense ‘semantic authority’, or ability to shape legal meanings and establish their communications as ‘authoritative reference points in legal discourse’.⁶¹ Other actors are generally expected to relate their interpretive claims to such pronouncements and justify any alternative interpretation.⁶² In short, in deciding cases international tribunals contribute to the development of principles which prospectively shape the rights and obligations of actors beyond the disputing parties.⁶³ This aspect of contemporary international adjudication has given rise to major legitimacy concerns. Unlike domestic courts, whose decisions can typically be overridden by legislation, international tribunals are largely not under equivalent forms of political control because treaties cannot be authoritatively interpreted or amended in the absence of consensus or majority support among the treaty parties.⁶⁴

⁵⁷ Philippa Webb, *International Judicial Integration and Fragmentation* (OUP 2013) 206; Christian J Tams and Antonios Tzanakopoulos, ‘Barcelona Traction at 40: The ICJ as an Agent of Legal Development’ (2010) 23 LJIL 781, 785.

⁵⁸ von Bogdandy and Venzke (n 7) 109.

⁵⁹ Ibid 109-11; Christian J Tams, ‘The ICJ as a “Law-Formative Agency”’: Summary and Synthesis’ in Christian J Tams and James Sloan (eds), *The Development of International Law by the International Court of Justice* (OUP 2013) 669.

⁶⁰ Webb (n 57) 206; Tams, *ibid*, 651-652.

⁶¹ Ingo Venzke, *How Interpretation Makes International Law: On Semantic Change and Normative Twists* (OUP 2012) 63.

⁶² Ibid 146-7.

⁶³ Grossman (n 7) 68; Lowe (n 10) 212-214; von Bogdandy and Venzke (n 7) 106, 207.

⁶⁴ von Bogdandy and Venzke (n 7) 124-5; Regarding how to conceptualise the legitimacy of international tribunals see generally Nienke Grossman, ‘Legitimacy and International Adjudicative Bodies’ (2009) 41 GWILR 107, 115 (suggesting a legitimate tribunal is ‘one whose authority is perceived as justified’, and that such legitimacy depends upon being seen as ‘[1] fair and unbiased, [2] interpreting and applying norms consistent with what states believe the law is or should be, and [3] transparent and infused with democratic norms’). Grossman focuses on why states join and stay within a dispute resolution mechanism, which provides a fuller understanding than asking why particular rulings deserve obedience: 118; It is useful to distinguish between the internal legitimacy of an international tribunal, in the eyes of immediate participants, and its external legitimacy from the perspective of wider stakeholders or affected parties: see eg Joseph HH Weiler, ‘The Rule of Lawyers and the Ethos of Diplomats: Reflections on the Internal and External Legitimacy of WTO Dispute Settlement’ (2001) 35 JWT 191, 193; Conceptually, legitimization is

This aspect of the adjudicatory function is broadly where the first problem traced by this thesis arises. I will demonstrate that adjudicators, in interpreting and applying relevant legal norms, face a challenge of ensuring ‘legal certainty through predictable interpretation of the law and at the same time ... [making] allowance for legal change, without which law cannot live’.⁶⁵ The challenge of responding to demands for change while nevertheless providing a sufficient degree of legal certainty and stability has been recognised as one of the key problems facing international adjudicators by many who have reflected on the international adjudicatory function.⁶⁶ Writing in 1933, Hersch Lauterpacht considered the issue in order to counter the argument that the absence of a legislature, which could adjust the law to the changing conditions of international society, was a reason supporting the non-justiciability of certain disputes.⁶⁷ As Lauterpacht highlighted, despite the difficulties created by the absence of an international legislature, ‘the function of courts as an instrument for adapting the existing law to changed conditions’ should not be underestimated.⁶⁸ In an observation which no longer seems to hold true, Lauterpacht suggested that as international law was concerned with regulating the external relations of states its subject matter was less liable to be affected by economic and other changes, although he recognised that responding to change would be a more pressing problem if international law were to develop to ‘regulate in detail the life of its individual members’.⁶⁹

In contrast, writing in the early 1970s, when the shift from a sparse international law of coexistence to a much denser, wide-ranging, and domestically focused international law

always relative to a particular audience, and the bases of legitimacy can be process-based, focused on substantive aims, or outcomes actually achieved: Christopher A Thomas, ‘The Uses and Abuses of Legitimacy in International Law’ (2014) 34 OJLS 729, 747–52.

⁶⁵ Ilmar Tammelo, *Treaty Interpretation and Practical Reason: Towards a General Theory of Legal Interpretation* (Law Book Company 1967) 53–4.

⁶⁶ In addition to the references discussed in text see: RP Anand, ‘Role of International Adjudication’ in Leo Gross (ed), *The Future of the International Court of Justice*, vol 1 (Oceana Publications 1976) 11–14; Ijaz Hussain, *Dissenting and Separate Opinions at the World Court* (Martinus Nijhoff 1984) 79–80; Webb (n 57) 179–180; Lyndell V Prott, *The Latent Power of Culture and the International Judge* (Professional Books 1979) 84–96; Thomas M Franck, *Fairness in International Law and Institutions* (OUP 1998) 7; Outside the international law context see Roscoe Pound, *An Introduction to the Philosophy of Law* (Rev ed, Yale University Press 1954) 3, 9.

⁶⁷ Hersch Lauterpacht, *The Function of Law in the International Community* (OUP 1933) 245–247, generally Pt IV (‘Stability and Change in International Law’).

⁶⁸ Ibid 250–251, 254–257, 344; Sir Gerald Fitzmaurice, ‘Hersch Lauterpacht-The Scholar as Judge-Part I’ (1961) 37 BYBIL 1, 18–19 (international community ‘peculiarly dependent on its international tribunals for development and clarification of the law’).

⁶⁹ Lauterpacht (n 67) 249–250.

of cooperation was apparent,⁷⁰ Wilfred Jenks argued that while change itself was not novel, the problem was of a ‘new order of magnitude’.⁷¹ For Jenks, the ability of international law to respond to ‘acute social and economic problems in a world of constant political and technological change’ required permeating international law ‘with a new conceptual, institutional and procedural vitality’. Legal thought needed to develop ‘new applications of old principles in novel situations’ and balance ‘the conflicting claims of stability and change’.⁷² Jenks saw the latter dilemma as a key challenge facing international adjudication, which was ‘brought into sharp relief’ by the contemporary case law of the ICJ.⁷³ In the context of the challenge by newly independent states to existing principles of international law, Jenks saw the reluctance of established states to submit their disputes to adjudication as reflecting a lack of predictability in the ICJ. Specifically, there was a lack of ‘confidence that the Court will follow those rules of law, right or wrong, which have hitherto been regarded as usually accepted’, and not inject new and unorthodox elements ‘into the consideration of the matter in an unpredictable manner’.⁷⁴ Conversely, as Judge Fitzmaurice highlighted, the reluctance of newly independent states to submit their disputes for adjudication reflected the prospect that the Court would apply existing principles that they did not accept, and would not innovate.⁷⁵ More recently, Judge Higgins, speaking as President of the ICJ, suggested that ‘changes in the world’ have an impact on the Court’s work, whose task is to ‘provide that core predictability that distinguishes law from politics, but ... to do so in a way that is responsive to the legitimate needs and aspirations of the international community’.⁷⁶

⁷⁰ The seminal account of this shift is Wolfgang Friedmann, *The Changing Structure of International Law* (Columbia University Press 1964) 61–71 and *passim*; See also Joseph HH Weiler, ‘The Geology of International Law: Governance, Democracy and Legitimacy’ (2004) 64 *ZaöRV* 547.

⁷¹ C Wilfred Jenks, ‘Economic and Social Change and the Law of Nations’ (1973) 138 *RdC* 455, 493; C Wilfred Jenks, ‘Orthodoxy and Innovation in the Law of Nations’ (1971) 57 *Proceedings of the British Academy* 215, 215; Similarly from the same period: Sir Gerald Fitzmaurice, ‘The Future of Public International Law and of the International Legal System in the Circumstances of Today’ in Institut de Droit International (ed), *Livre du Centenaire 1873-1973: Evolution et perspectives du droit international* (Karger 1973) 207–209.

⁷² Jenks, ‘Economic and Social Change’ (n 71) 494–6.

⁷³ Jenks, ‘Orthodoxy and Innovation’ (n 71) 223–233; Contrast the view of Anand, who, writing in the same period, also saw adapting international law to changed circumstances as a pressing problem. While Anand recognised that ‘courts can be helpful in readjusting the law’, he argued that attention was needed to developing complementary mechanisms of change: RP Anand, *International Courts and Contemporary Conflicts* (Asia Publishing House 1974) 429–431.

⁷⁴ C Wilfred Jenks, *The Prospects of International Adjudication* (Stevens & Sons 1964) 106.

⁷⁵ Fitzmaurice, ‘Future’ (n 71) 284–5.

⁷⁶ Speech by President Rosalyn Higgins, Sixtieth Anniversary Sitting of the ICJ, 12 April 2006, <<http://www.icj-cij.org/presscom/index.php?pr=1004&lg=en&pt=&p1=6&p2=1>>.

This thesis agrees with the above perspectives that balancing the competing interests of stability and legal certainty on the one hand, and change and responsiveness to new demands on the other, is a pressing problem for international adjudication. In addition to contemporary international law being expected to be responsive to an increasing range of social demands,⁷⁷ in many areas of international law there is little new treaty law being agreed,⁷⁸ as compared to a large number of disputes being adjudicated,⁷⁹ meaning the burden of appropriately responding to demands for change largely falls on adjudicators. Through their decisions international adjudicators perform a crucial function of clarifying the content of abstract norms and adapting them to changed circumstances.⁸⁰ Relatedly, as Vaughan Lowe highlights, international litigation often operates ‘as an alternative to, or substitute for, law reform and treaty-making’.⁸¹ For example, we will see in Chapter Three that despite the negotiating process within the WTO largely being stalled, WTO law has continued to evolve through new cases being litigated. While judges in any legal system try to avoid being seen to make law, this pressure is ‘particularly heavy’ for international adjudicators,⁸² including because, despite differences in appointment arrangements, their institutional position is ultimately created via state consent,⁸³ and as noted above, serious concerns exist about the legitimacy of law-making by international tribunals.⁸⁴

⁷⁷ Campbell McLachlan, ‘The Evolution of Treaty Obligations in International Law’ in Georg Nolte (ed), *Treaties and Subsequent Practice* (OUP 2013) 72; Christian Djeflal, *Static and Evolutive Treaty Interpretation: A Functional Reconstruction* (CUP 2015) 210–211.

⁷⁸ Joost Pauwelyn, Rams A Wessel and Jan Wouters, ‘When Structures Become Shackles: Stagnation and Dynamics in International Lawmaking’ (2014) 25 EJIL 733, 734–737 (providing evidence of a significant slowdown in the conclusion of multilateral and bilateral treaties in the first decade of the 2000s, as compared to the 1990s and every decade since the 1950s); See also McLachlan, *ibid* 70–72.

⁷⁹ See Alter (n 5) 105 (charting binding rulings issued by permanent international courts by year up until 2011, excluding the exceptionally active European Court of Human Rights and European Court of Justice. This shows that more rulings were issued in each year from 2003 than had been issued between 1945 and 1989. Notably, her data excludes investment arbitration, which, as outlined in Chapter Six, has been an exceptionally active site of international adjudication).

⁸⁰ Shany, *Effectiveness* (n 6) 38–39; Shelton (n 39) 553; von Bogdandy and Venzke (n 7) 7, 108 (‘Abstract norms alone can hardly generate a stabilization of expectations, since their meaning is all too uncertain in individual disputes. International law thus needs the courts to further develop normative expectations’).

⁸¹ Lowe (n 10) 214; See also Paul F Diehl and Charlotte Ku, *The Dynamics of International Law* (CUP 2010) 64–70, 147–150 (noting this role of international tribunals within a broader theory of international legal change whereby major changes occur infrequently, for example through the adoption of multilateral treaties, and stability in the international legal system is the norm).

⁸² Tammelo (n 65) 53.

⁸³ The appointment arrangements for adjudicators are considered as part of analysing relevant contextual factors for understanding each of the adjudication contexts studied.

⁸⁴ See above n 7.

In analysing the challenge adjudicators face in balancing the competing interests of stability and change it is useful to distinguish between the interrelated issues of changes in relevant legal norms and changes in relevant facts which affect the application of such norms. Where the content of a legal norm itself changes – for example if the meaning of a treaty term must be determined by referring to other legal norms which may change – we are dealing with change or evolution in the law.⁸⁵ In contrast, the meaning of a legal norm may remain constant but the norm may be applied to changing factual circumstances which will affect what the norm requires of those bound by it at a particular time.⁸⁶ This reflects the distinction between interpretation and application recognised in debates over treaty interpretation. Whereas interpretation refers to ‘determining the meaning of a rule’, application is the process of ‘determining the consequences which the rule attaches to the occurrence of a given fact’.⁸⁷ As we will see, environmental cases have frequently raised both the question of potential changes in relevant legal norms and that of changes in relevant facts which affect the application of legal norms.

Martti Koskenniemi, consistent with his broader claims concerning the indeterminacy of legal argument, has argued that the tendency to speak of balancing stability and change ‘restates the problem’ because choosing between competing claims of stability and change requires evaluating ‘what is equitable in certain circumstances and what is not’.⁸⁸ For Koskenniemi, any choice between apparently opposing arguments favouring stability and change must rely on an external criterion of justice as no general legal rule exists which could resolve the matter in a way that is not open to competing, equally legally plausible arguments.⁸⁹ Koskenniemi is correct that any question of deciding between or balancing competing claims of stability and change has to be understood within the circumstances of a particular case, and doctrine cannot provide a general rule which would resolve the issue in a definitive way for future cases.⁹⁰ The legal techniques used

⁸⁵ Panos Merkouris, ‘(Inter)Temporal Considerations in the Interpretative Process of the VCLT: Do Treaties Endure, Perdure or Exdure?’ (2014) 45 NYBIL 121, 132–3.

⁸⁶ Sondre Torp Helmersen, ‘Evolutive Treaty Interpretation: Legality, Semantics and Distinctions’ (2013) 6 EJLS 161, 162.

⁸⁷ *Case concerning the Factory at Chorzów (Germany v Poland)* (Claim for Indemnity – Jurisdiction) [1927] PCIJ Rep Series A No. 9, Diss. Op. Ehrlich 39; Similarly: Harvard Law School, ‘Draft Convention on the Law of Treaties: Comment to Article 19’, reprinted in (1935) 29 Supplement to the AJIL, 938; For further discussion and references: Anastasios Gourgourinis, ‘The Distinction between Interpretation and Application of Norms in International Adjudication’ (2011) 2 JIDS 31, 43–48.

⁸⁸ Koskenniemi, *From Apology to Utopia* (n 17) 452–55.

⁸⁹ *Ibid* 452–461.

⁹⁰ *Ibid* 451, 457, 461.

in response to this challenge facing adjudicators, such as principles of treaty interpretation, often support plausible arguments in favour of both stability and change.⁹¹ Furthermore, some kind of context-dependent recourse to equity or justice is undeniably a part of any adjudicatory exercise. Koskenniemi's discussion reminds us that the question in any case is stability for whom, or which kind of interests,⁹² 'and *what kind of* and whose *consent* it is that counts and *which kind of* teleology it is that is working'.⁹³ None of this, however, defeats the suggestion that adjudicators face a dilemma of somehow reconciling the competing interests of stability and change when they interpret and apply relevant legal norms, and how this problem is responded to matters for the role played by contemporary adjudication. Framing the problem facing adjudicators in these terms provides a sharper focus for the comparison undertaken than framing it as 'what is equitable in certain circumstances'.

Many international tribunals are embedded within wider cooperative regimes with particular aims and also perform a 'regime support' function in the sense of contributing to the goals of the overarching regime.⁹⁴ For example, the WTO dispute settlement system is intended to 'provide security and predictability to the multilateral trading system'⁹⁵ and must be understood in light of the broader goals of the WTO, which include trade liberalisation but also, *inter alia*, raising living standards, meeting the development needs of the developing world, 'optimal use of the world's resources in accordance with the objective of sustainable development', and environmental protection.⁹⁶ Similarly, we will see that UNCLOS dispute settlement was intended to preserve the bargain contained within that treaty,⁹⁷ which was intended as a comprehensive 'legal order for the seas' that would promote 'peaceful uses of the seas and oceans, the equitable and efficient utilization of their resources, the conservation of their living resources, and the study, protection and preservation of the marine environment'.⁹⁸ Key aspects of the UNCLOS dispute settlement system clearly serve functional goals of the wider regime established

⁹¹ Djeffal (n 77) 351–4 (highlighting the intertemporal openness of the VCLT provisions on interpretation).

⁹² Todd Weiler, 'Who, Then, Shall Judge? The Interpretation of International Investment Agreements and the Rule of International Law' in Arthur W Rovine (ed), *Contemporary Issues in International Arbitration and Mediation: The Fordham Papers 2013* (Brill Nijhoff 2015) 329–330.

⁹³ Koskenniemi, *From Apology to Utopia* (n 17) 460–461.

⁹⁴ Shany, *Effectiveness* (n 6) 43–4.

⁹⁵ DSU, Art 3(2).

⁹⁶ WTO Agreement, preamble.

⁹⁷ See below Ch IV(A)(6).

⁹⁸ United Nations Convention on the Law of the Sea (1982) 1833 UNTS 3, preamble ('UNCLOS').

by the Convention, such as the power of tribunals to grant provisional measures to ‘prevent serious harm to the marine environment’,⁹⁹ or the unique mechanism for prompt release of detained vessels which prevents undue impingement on the regime’s value of freedom of navigation.¹⁰⁰ As noted above, the role of certain international tribunals in furthering the goals of specific regimes has given rise to concerns that regime-based adjudicators may promote values specific to their own regime to the exclusion of other concerns.¹⁰¹ At the same time, as we will see, regime-based adjudicators have at times made important contributions to legitimating the wider regimes within which they are embedded, for example by signalling that they are taking into account interests which could be at risk of being undermined.¹⁰²

Another key function of international adjudication is controlling the exercise of public authority, such as where the conduct of state authorities is subject to an international-level discipline.¹⁰³ For example, Karen Alter refers to an ‘administrative review’ role of international adjudicators, whereby they review the legality of domestic administrative decisions that are subject to an international law standard, and a related ‘enforcement role’ whereby adjudicators assess state compliance with applicable international obligations.¹⁰⁴ Yuval Shany and Dinah Shelton both suggest international courts engage in ‘compliance monitoring’, and argue that this function is more present in some courts, such as WTO adjudication or regional human rights courts, than others, such as the ICJ and ITLOS, which they classify as primarily concerned with dispute settlement.¹⁰⁵ This thesis departs to some degree from the latter claim, because in the analysis of ICJ and ITLOS cases undertaken it will be shown that these adjudicators also frequently engage in reviewing state conduct for compliance with applicable norms and many issues which are central to the ‘review’ function arise, such as how to calibrate the appropriate intensity of review and which methods of review to utilise.¹⁰⁶

⁹⁹ UNCLOS, Arts 290(1), 290(5).

¹⁰⁰ See below Ch IV(A)(5).

¹⁰¹ See above n 9.

¹⁰² Regarding my working definitions of the terms regime and legitimacy see above n 9 and n 64.

¹⁰³ von Bogdandy and Venzke (n 7) 14.

¹⁰⁴ Alter (n 5) 13–15.

¹⁰⁵ Yuval Shany, ‘One Law to Rule Them All: Should International Courts Be Viewed as Guardians of Procedural Order and Legal Uniformity?’ in Ole Kristian Fauchald and André Nollkaemper (eds), *The Practice of International and National Courts and the (De-)Fragmentation of International Law* (Hart Publishing 2012) 19–20; Shelton (n 39) 564–66.

¹⁰⁶ Admittedly how the ICJ resolves questions of standing will influence the degree to which it performs this function. If the ICJ favours a strict, bilateral approach to standing it will not be an appropriate setting

The function of international tribunals in reviewing state conduct for compliance with applicable international norms is where the second pressing problem traced by this thesis arises. Specifically, I analyse adjudicators' approaches to the interrelated questions of the standard and method of review. The standard of review refers to the intensity of the scrutiny applied by international adjudicators to prior determinations made by another decision-maker, such as an organ of the state whose conduct is being scrutinised for compliance with international obligations.¹⁰⁷ The standard of review applied can fall on a large variety of points 'on a continuum bounded by total deference to justifications provided or analysis performed by a primary decision-maker at one end, and substitutionary (*de novo*) review of the relevant measure and its justification at the other'.¹⁰⁸ This question is of central importance for the role played by international adjudication, and its legitimacy, because it determines the division of powers between the international and national levels.¹⁰⁹ Furthermore, outside the specific context of WTO anti-dumping disputes,¹¹⁰ the question of the applicable standard of review is not explicitly determined by treaty law but by international adjudicators themselves through the exercise of their inherent powers to define their own procedures.¹¹¹ As we will see, the prospect of international adjudicators scrutinising, and potentially second-guessing, sensitive domestic determinations of risk taken in adopting measures to protect the environment or human health raises acute legitimacy concerns.

for resolving questions of compliance with multilateral treaties. In contrast, limited instances where the Court has permitted standing on an *erga omnes* basis are signs that the Court's function may extend 'from one of merely settlement of disputes, to one [of] providing a monitoring mechanism for multilateral treaties': Malgosia Fitzmaurice and Dai Tamada, 'Introduction' in Malgosia Fitzmaurice and Dai Tamada (eds), *Whaling in the Antarctic: Significance and Implications of the ICJ Judgment* (Brill Nijhoff 2016) 2–3.

¹⁰⁷ Wouter Werner and Lukasz Gruszczynski, 'Introduction' in Gruszczynski and Werner (eds), *Deference in International Courts and Tribunals* (n 23) 1–2; Henckels (n 23) 29–30.

¹⁰⁸ Caroline Henckels, 'Balancing Investment Protection and the Public Interest: The Role of the Standard of Review and the Importance of Deference in Investor-State Arbitration' (2013) 4 JIDS 197, 201; Werner and Gruszczynski (n 107) 1–2.

¹⁰⁹ Claus-Dieter Ehlermann and Nicolas Lockhart, 'Standard of Review in WTO Law' (2004) 7 JIEL 491, 492–3; Michael Ioannidis, 'Deference Criteria in WTO Law and the Case for a Procedural Approach' in Gruszczynski and Werner (eds), *Deference in International Courts and Tribunals* (n 23) 92–3; Henckels (n 23) 30; Andreas von Staden, 'The Democratic Legitimacy of Judicial Review Beyond the State: Normative Subsidiarity and Judicial Standards of Review' (2012) 10 ICON 1023.

¹¹⁰ See Agreement on Implementation of Article VI of the General Agreement on Tariffs and Trade 1994, WTO Agreement, Annex IA (1994) 1868 UNTS 201, Art 17.6.

¹¹¹ Werner and Gruszczynski (n 107) 1; Yuval Shany, 'Toward a General Margin of Appreciation Doctrine in International Law?' (2006) 16 EJIL 907, 911; Regarding the inherent powers of international tribunals see Brown (n 49).

The problem of the applicable standard of review is important in the context of adjudication of a complex and wide-ranging international law of cooperation. Increasingly, determining whether states have complied with their treaty obligations requires adjudicators to consider contested questions based on specialist expertise – often of a scientific or technical character – which adjudicators are not well placed to answer *de novo*.¹¹² The issue of the standard of review is already the subject of much attention in the trade and investment literature.¹¹³ The move made by this thesis is to highlight that the same basic dilemmas concerning the distribution of decision-making power and the relative knowledge and legitimacy of international adjudicators arise in ‘fact-intensive’ environmental disputes in the UNCLOS and ICJ contexts.¹¹⁴ In short, this part of the thesis highlights underappreciated aspects of equivalence regarding the problem of the standard of review, and new opportunities for comparative learning, as well as important contextual differences which shape how the problem arises in different settings.

In analysing how adjudicators review state conduct for compliance with international norms across the four contexts I also analyse the closely related issue of the method of review, or legal test, employed by adjudicators.¹¹⁵ There is an active debate within WTO and investment law, fuelled by developments in case law, concerning the appropriateness of two methods of review which can be used by adjudicators to respond to the problem of balancing competing interests protected by a legal regime.¹¹⁶ One of these methods of review, necessity or ‘least restrictive means’ testing, is limited to inquiring whether there was an alternative measure which was reasonably available to the regulating state and would have achieved its aim but would have been less restrictive of another right or interest protected by the relevant legal regime. In contrast, an alternative test, ‘full proportionality’ review, involves applying an additional step whereby an open-ended evaluation of the relative importance of the rights and interests at stake is incorporated

¹¹² Makane Moïse Mbengue and Rukmini Das, ‘The ICJ’s Engagement with Science: To Interpret or Not to Interpret?’ (2015) 6 *JIDS* 568, 568–9, 576; Joel P Trachtman, ‘International Legal Control of Domestic Administrative Action’ (2014) 17 *JIEL* 753, 754–6, 784.

¹¹³ See eg the literature cited above n 23, 109.

¹¹⁴ Similarly: Jacqueline Peel, ‘Of Apples and Oranges (and Hormones in Beef): Science and the Standard of Review in WTO Disputes under the SPS Agreement’ (2012) 61 *ICLQ* 427, 457–458.

¹¹⁵ For similar definitions of the term ‘method of review’ see Henckels (n 23) 31; Mads Andenas and Stefan Zleptnig, ‘Proportionality: WTO Law in Comparative Perspective’ (2007) 42 *Texas ILJ* 371, 392–3.

¹¹⁶ For recent contributions to the debate see above n 23; Alec Stone Sweet and Giacinto della Cananea, ‘Proportionality, General Principles of Law, and Investor-State Arbitration: A Response to Jose Alvarez’ (2014) 46 *NYUJILP* 911.

into the balancing exercise. These tests represent, respectively, the last two stages of proportionality analysis, as it is widely understood, which is a method for balancing competing legally protected interests developed in domestic public law that has become widely utilised across national, regional and international adjudication settings.¹¹⁷ Full proportionality review has given rise to serious legitimacy concerns on the basis that international adjudicators may not be authorised or well placed to evaluate the relative importance of competing regulatory aims pursued by states.¹¹⁸

As with the standard of review, this thesis will contribute to the existing literature by showing that there is an underappreciated possibility for comparison between the trade and investment contexts, where this debate is well established, and UNCLOS and ICJ adjudication, where this issue has been less remarked on, despite comparable problems and adjudicatory responses arising in environmental cases. Again, however, it will be shown that differences in context remain important and shape how the problem of the method of review arises in different settings. Analysing this issue in wider comparative perspective is important because international adjudicators are, across diverse settings, increasingly faced with balancing partially competing interests,¹¹⁹ and there is a need for legal techniques which can meet this challenge.¹²⁰

The third problem facing contemporary adjudicators analysed by this thesis concerns how adjudicators' pronouncements contribute to broader processes of dispute resolution. Specifically, I am interested in whether adjudication is largely retrospective and seeks to dispose of the parties' dispute, or whether adjudication also has a partly prospective focus and seeks to provide the disputing parties guidance for their future interactions, including in potentially rebuilding their relationship after adjudication. This aspect of my analysis builds on a number of strands of existing literature. As others have highlighted, in some

¹¹⁷ The prior stage of proportionality analysis requires that a measure pass the test of 'suitability'. This is often understood as a single step and involves asking whether the measure pursues a legitimate legal aim and whether the measure bears a causal relationship to, or will further in some way, that aim. Regarding proportionality analysis see generally Kingsbury and Schill (n 8) 37–39; Henckels (n 23) 24–6; Stone Sweet and della Cananea (n 116) 916–8.

¹¹⁸ See eg Jürgen Kurtz, 'Adjudging the Exceptional at International Investment Law: Security, Public Order and Financial Crisis' (2010) 59 ICLQ 325, 366–9; Henckels (n 23) 164–168; Kati Kulovesi, *The WTO Dispute Settlement System: Challenges of the Environment, Legitimacy and Fragmentation* (Kluwer Law International 2011) 192.

¹¹⁹ Shelton (n 39) 553.

¹²⁰ Henckels (n 23) 6.

instances adjudication is likely to be most effective in terms of dispute resolution where it clarifies key contested issues of law and fact and provides a framework in which the parties can resolve their dispute, for example through subsequent negotiation.¹²¹ This aspect of my analysis is relevant to the role of adjudicators in reviewing state conduct for compliance with international norms, with many suggesting that modern adjudicators are, given their legal training, better equipped to adjudicate over the decision-making procedure a state has followed, such as which interests it has taken into account, rather than reviewing the merits of an underlying decision.¹²² Scholars focusing on particular regimes have also praised facilitative and procedurally focused forms of adjudicatory review. For example, many have argued that certain WTO GATT Article XX cases offer a desirable example of adjudication imposing procedural guidelines on the disputing parties' interactions, such as requiring them to pursue cooperative solutions, but leaving the parties some scope to resolve the underlying dispute themselves.¹²³ Law of the sea commentators have also praised the 'predominantly facilitative'¹²⁴ or 'conflict management role'¹²⁵ frequently performed by ITLOS, whereby the Tribunal has clarified the relevant legal framework and ordered the disputing parties to engage in further cooperation or environmental monitoring.

However, facilitative forms of adjudication are also open to potential criticisms. As we will see, an entirely substance-neutral form of review is an illusion, and even under more procedural forms of review adjudicators must make important normative choices, such as how far states must go in considering foreign interests or pursuing cooperative solutions.¹²⁶ The tendency of some adjudicators to proceduralise disputes has also been criticised as undermining the aims of the substantive treaty disciplines concerned, and

¹²¹ Anna Spain, 'Examining the International Judicial Function: International Courts as Dispute Resolvers' (2011) 34 *Loy LA Int'l & Comp LR* 5, 10, 30; JG Merrills, 'The Mosaic of International Dispute Settlement Procedures: Complementary or Contradictory?' (2007) 54 *NILR* 361, 368–9; Laurence Boisson de Chazournes and Antonella Angelini, 'After "The Court Rose": The Rise of Diplomatic Means to Implement the Pronouncements of the International Court of Justice' (2012) 11 *LPICT* 1, 26–31; Lowe (n 10) 222.

¹²² See eg Trachtman (n 112) 754–56; Ioannidis (n 109) 111.

¹²³ von Bogdandy and Venzke (n 7) 206; Sungjoon Cho, 'Of the World Trade Court's Burden' (2009) 20 *EJIL* 675, 717–720; Further literature cited below Ch III(D).

¹²⁴ Natalie Klein, *Dispute Settlement in the UN Convention on the Law of the Sea* (CUP 2005) 83–4.

¹²⁵ Robin Churchill, 'Some Reflections on the Operation of the Dispute Settlement System of the UN Convention on the Law of the Sea During its First Decade' in David Freestone, Richard Barnes and David Ong (eds), *The Law of the Sea: Progress and Prospects* (OUP 2006) 411–12.

¹²⁶ Andrew Lang, *World Trade Law after Neoliberalism: Reimagining the Global Economic Order* (OUP 2011) 345–348.

thus, for example, not producing any net improvement in environmental outcomes.¹²⁷ Relatedly, any shift towards something less than full adjudication could weaken international law and adjudication as mechanisms for securing shared international interests.¹²⁸

The contribution of adjudicators as ‘dispute resolvers’¹²⁹ is heavily influenced by the remedies and institutional architecture of each adjudication setting. For example, I will argue that the prospectively focused nature of WTO remedies, and the fact that findings of non-compliance by WTO adjudicators are followed by a process of diplomatic bargaining, means it makes particular sense to view adjudication as contributing to a broader process of dispute resolution. WTO adjudicators clarify the legal framework for the parties’ interactions, including any requirements to consider affected foreign interests, and disputes are resolved in the shadow of such adjudicatory guidance through negotiation under the supervision of the WTO’s Dispute Settlement Body. In contrast, I will argue that we rarely see investment arbitrators attempting to contribute to a broader process of dispute resolution, as opposed to arbitrators seeking to completely dispose of the parties’ dispute. This is due to several factors including that compensation is the dominant remedy used in investment treaty arbitration, and tribunals are constituted ad hoc and are not well equipped to supervise post-adjudication bargaining or cooperation between the parties. The commercial rather than diplomatic orientation of the investment regime, and the fact that in many instances the disputing parties will no longer have an ongoing relationship by the time of an award, further explain why we do not see adjudicators performing a partly facilitative role.

2. *The Relationship of this Thesis to Fragmentation Debates*

Debates over fragmentation, or, more accurately, the increasing diversity of international law,¹³⁰ constitute part of the background which has provoked this thesis, rather than its

¹²⁷ Tim Stephens, *International Courts and Environmental Protection* (CUP 2009) 100–102; See also the critique of proceduralising environmental disputes in Martti Koskenniemi, ‘Peaceful Settlement of Environmental Disputes’ (1991) 60 *Nordic JIL* 73.

¹²⁸ Caroline E Foster, ‘Diminished Ambitions? Public International Legal Authority in the Transnational Economic Era’ (2014) 17 *JIEL* 355, 357, 374; Caroline E Foster, ‘Adjudication, Arbitration and the Turn to Public Law “Standards of Review”: Putting the Precautionary Principle in the Crucible’ (2012) 3 *JIDS* 525, 557–8

¹²⁹ Spain (n 121).

¹³⁰ James Crawford, ‘Chance, Order, Change: The Course of International Law’ (2013) 365 *RdC* 9, 228.

final destination. Accordingly, I will briefly outline such debates and what my inquiry takes from them. Such debates concern the rise ‘of specialized and (relatively) autonomous rules or rule-complexes, legal institutions and spheres of legal practice’.¹³¹ From the mid-1990s this led to prominent fears of ‘specialized law-making and institution-building’ occurring in relative ignorance of developments in other fields of international law, leading to the potential for ‘conflicts between rules ... deviating institutional practices, and possibly, the loss of an overall perspective on the law’.¹³² The most famous expression of such fears were the concerns raised by multiple sitting and retired members of the ICJ, a generalist institution, about the emergence of specialised courts and tribunals and the potential for conflicting jurisprudence.¹³³ In response to such fears, the topic was considered by the International Law Commission, which in a seminal study completed in 2006 argued that while international law had become more pluralistic, general international law already equipped lawyers with a set of legal techniques or ‘a toolbox’ that would enable them to respond to the resulting problems.¹³⁴ The basic argument here, also made by other leading international law generalists, is that diverse international legal regimes continue to make use of a common set of concepts, argumentative techniques, or grammar, drawn from wider international law.¹³⁵

Against this view, another broad strand of scholarship paints a picture of disordered global legal pluralism, reflecting deep tensions between the different functional rationalities animating different sectors of global society which cannot be resolved through doctrinal means.¹³⁶ Despite the fears expressed at the turn of the century,

¹³¹ ILC, ‘Fragmentation of International Law: Difficulties Arising from the Diversification and Expansion of International Law – Report of the Study Group of the International Law Commission Finalized by Martti Koskenniemi’ (13 April 2006) UN Doc A/CN.4/L.682 [8].

¹³² Ibid.

¹³³ Address by Judge Gilbert Guillaume, President of the ICJ, to the UN General Assembly, 26 October 2000, <<http://www.icj-cij.org/court/index.php?pr=84&pt=3&p1=1&p2=3&p3=1>>; Address by Judge Stephen M Schwebel, President of the ICJ, to the UN General Assembly, 26 October 1999, <<http://www.icj-cij.org/court/index.php?pr=87&pt=3&p1=1&p2=3&p3=1>>; RY Jennings, ‘The Judiciary, International and National, and the Development of International Law’ (1996) 45 ICLQ 1, 5–6; Shigeru Oda, ‘Dispute Settlement Prospects in the Law of the Sea’ (1995) 44 ICLQ 863, 864–5.

¹³⁴ ILC (n 131) [20], [492].

¹³⁵ Ibid [493(3)]; Pierre-Marie Dupuy, ‘A Doctrinal Debate in the Globalisation Era: On the “Fragmentation” of International Law’ (2007) 1 EJLS 25, 28; James Crawford, *International Law as an Open System: Selected Essays* (Cameron May 2002) 17, 37.

¹³⁶ Note that in part such scholarship has a different focus, as it often focuses on private or hybrid public-private forms of transnational ordering, and is not confined to public international law: Andreas Fischer-Lescano and Gunther Teubner, ‘Regime-Collisions: The Vain Search for Legal Unity in the Fragmentation of Global Law’ (2003) 25 Michigan JIL 999, 1004, 1006, 1017, 1045; See also Paul Schiff Berman, ‘A Pluralist Approach to International Law’ (2007) 32 YJIL 301; Nico Krisch, *Beyond Constitutionalism: The*

‘fragmentation’, or the increasing diversity of international law, has proved more manageable than the early alarmist perspectives suggested.¹³⁷ International tribunals increasingly consider each other’s approaches to similar problems and adopt a common approach.¹³⁸ As Dirk Pulkowski suggests, while treaty-based regimes have diverse purposes, and may ultimately conflict or diverge, ‘a regime transcendent discourse’ is possible because international law provides a common grammar, as well a certain shared pre-understandings or institutional facts.¹³⁹

This thesis is not primarily an intervention which continues the above well-established debates concerning international law’s unity. Instead, it takes as part of its point of departure that a ‘regime transcendent discourse’ is to some degree occurring, including among international tribunals.¹⁴⁰ Put differently, a diverse international legal order requires versatile international lawyers,¹⁴¹ willing to engage in discussions across institutional contexts and issue areas.¹⁴² As outlined above, the most important contributions of this thesis concern our understanding of key problems facing adjudicators and potential legal responses, given the demands of contemporary international law and the limitations of adjudicators’ roles. That said, my approach has partly been motivated by the observation that there is still an insufficient degree of communication between different types of international lawyers.¹⁴³ The cross-cutting and comparative style of this study is intended as a counterpoint to the narrow and regime-specific focus of much international law scholarship, and the tendency of the

Pluralist Structure of Postnational Law (OUP 2010); Oren Perez, *Ecological Sensitivity and Global Legal Pluralism: Rethinking the Trade and Environment Conflict* (Hart Publishing 2004) (analysing several private regimes relevant to the trade and environment conflict from a pluralist perspective).

¹³⁷ Koskenniemi, ‘Case for Comparative’ (n 33) 5.

¹³⁸ Anne Peters, ‘The Refinement of International Law: From Fragmentation to Regime Interaction and Politicization’, MPIL Research Paper Series No 2016-19, 20–22 <http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2823512>; Sir Christopher Greenwood, ‘Unity and Diversity in International Law’ in Mads Andenas and Eirik Bjorge (eds), *A Farewell to Fragmentation: Reassertion and Convergence in International Law* (CUP 2015) 47–52; Brown (n 24) 255–258; Teitel and Howse (n 18) 965, 989–90.

¹³⁹ Dirk Pulkowski, *The Law and Politics of International Regime Conflict* (OUP 2014) 255–56, 271.

¹⁴⁰ See the literature cited above n 138.

¹⁴¹ See above n 33.

¹⁴² Yannick Radi, ‘In Defence of “Generalism” in International Legal Scholarship and Practice’ (2014) 27 LJIL 303; Mads Andenas and Eirik Bjorge, ‘Introduction: From Fragmentation to Convergence in International Law’ in Andenas and Bjorge (eds), *A Farewell to Fragmentation* (n 138) 2, 7; Rosalyn Higgins, ‘A Babel of Judicial Voices? Ruminations from the Bench’ (2006) 55 ICLQ 791, 804.

¹⁴³ Similarly: Jorge E Viñuales, *Foreign Investment and the Environment in International Law* (CUP 2012) 1 (‘Investment lawyers and environmental lawyers barely speak to each other’); Tuomas Kuokkanen, *International Law and the Environment: Variations on a Theme* (Brill 2002) 347.

specialisations to ignore each other.¹⁴⁴ There are, of course, qualifications to this point, including that some practitioners work across different regimes, and there is, to some degree, a movement of adjudicators between different settings.¹⁴⁵ Yet such movement is still too rare in international law scholarship.¹⁴⁶

B. An Overview of the Chapters to Come

Chapter Two justifies several important methodological choices made in undertaking this study, including why the four selected sites of adjudication were covered, how the category of environmental cases has been delimited, and how insights have been incorporated from methodological debates in comparative law.

Chapter Three turns to analysing the three selected problems facing adjudicators – change, review of state conduct, and dispute resolution – in the context of WTO dispute settlement. In this regime, treaty-making is largely stalled given a lack of consensus amongst a diverse membership. While there are important examples of WTO adjudicators incrementally adjusting treaty norms given wider developments in international law, the role of non-WTO law remains contested, and adjudicators are under heavy pressure not to be seen to change members’ obligations. In the methods of review utilised in scrutinising states’ measures WTO adjudicators have consistently employed a deferential form of least restrictive means testing and sought to avoid second-guessing the non-trade regulatory aims pursued by members. They have also developed a highly structured approach to the standard of review to avoid themselves deciding contested scientific questions which frequently lie at the heart of environmental disputes. WTO dispute settlement is also an important example of adjudication contributing to broader processes of dispute resolution, reflecting its forward-looking system of remedies and diplomatic ethos.

¹⁴⁴ Also noting this tendency: Andrea Bianchi, ‘Gazing at the Crystal Ball (Again): State Immunity and Jus Cogens beyond Germany v Italy’ (2013) 4 JIDS 457, 463–4; Michael Waibel, ‘Interpretive Communities in International Law’ in Andrea Bianchi, Daniel Peat and Matthew Windsor (eds), *Interpretation in International Law* (OUP 2015) 158–165.

¹⁴⁵ Frédéric Gilles Sourgens, *A Nascent Common Law: The Process of Decision-Making in International Legal Disputes between States and Foreign Investors* (Brill Nijhoff 2015) 276–9; Webb (n 57) 200–1, 222; For example, many ICJ judges have acted as arbitrators under investment treaties or UNCLOS.

¹⁴⁶ As Sands notes, too often international law is studied as if it were made up of a set of self-contained areas which ‘exist in quasihermetical isolation’ despite this assumption being ‘false, and increasingly so’: Philippe Sands, ‘Sustainable Development: Treaty, Custom, and the Cross-Fertilization of International Law’ in Alan Boyle and David Freestone (eds), *International Law and Sustainable Development: Past Achievements and Future Challenges* (OUP 1999) 42–3.

Chapter Four analyses the three selected problems within UNCLOS adjudication, undertaken both by ITLOS and arbitral tribunals. UNCLOS is particularly open to being affected by subsequent changes in international law as it contains numerous generic terms, including general obligations to protect the marine environment, and instructs adjudicators to apply other relevant international law. This characteristic of UNCLOS is reflected in important examples of adjudicators incrementally updating the Convention. ITLOS' prompt release adjudication is a significant, often overlooked example of international adjudicators engaging in balancing competing legally protected interests through variants of proportionality analysis. It has given rise to pressing questions concerning the appropriate intensity of adjudicatory review because coastal states, whose conduct is being scrutinised, have much greater familiarity with relevant factual matters and are often pursuing the multilaterally endorsed goal of countering illegal fishing. Finally, UNCLOS environmental adjudication provides repeated examples of adjudication contributing to broader processes of dispute resolution, for example by ordering further cooperation between the disputing parties. This is because the Convention imposes broad obligations to cooperate and many of the decisions have been taken at a provisional measures stage.

Chapter Five focuses on ICJ litigation. Within this setting adjudicators' responses to the three selected problems are shaped by the Court's general and consent-dependent jurisdiction, which means that it adjudicates across diverse legal contexts and is particularly sensitive to consent-based concerns. There are repeated examples of the ICJ incrementally updating aging treaties in light of wider developments in international law, and the Court has often played an informal coordination role in the context of decentralised international lawmaking. In its environmental case law, the ICJ has repeatedly faced the question of how to balance partially competing interests, both protected by the relevant legal regime, and how intensely to scrutinise domestic-level determinations involving specialist expertise or an assessment of local circumstances. The Court's approach to such questions is heavily shaped by the particular context in which it adjudicates, reflecting the diversity of its work, although the legal techniques utilised in reviewing state conduct display key functional similarities with those seen in other contexts. The ICJ has often adjudicated with a partly prospective focus, seeking to facilitate future cooperation between the disputing parties, and again these practices are shaped by the contexts in which the Court adjudicates. For example, in many of these

disputes, the parties were best placed to determine ongoing monitoring or conservation measures for a shared resource, and the relevant treaty contained an institutional framework that could be utilised after adjudication.

Chapter Six concerns investment treaty arbitration. It highlights and explains key respects in which the adjudicatory practices of this regime differ from the other contexts studied. Investment treaty arbitrators, like other international adjudicators, play a role in broader processes of law-development. However, investment arbitrators' influence over the development of treaty standards is reduced because the regime is largely bilaterally constructed, meaning it is relatively easy for states to change by agreeing upon authoritative interpretations or concluding new treaties. States' decision to use ad hoc tribunals, and not to create any centralised appellate mechanism, has also decreased the potential influence of arbitrators over the development of relevant treaty standards. However, investment treaty arbitrators, by applying relevant treaty norms in particular disputes, play a crucial role in determining the permissible degree of change in the host state's regulatory system. This reflects that a key aim of the investment treaty regime is to exercise a degree of control over public decision-making in host states. In reviewing state conduct for compliance with investment norms arbitrators have endorsed many of the reasons for deference seen in other contexts, because they do not possess specialist forms of expertise which often underpin regulatory measures and are aware that domestic authorities are often better placed to exercise discretion. Investment arbitrators have also utilised variants of proportionality analysis, also seen in other contexts, reflecting that they are frequently faced with reviewing state measures which pursue a legitimate regulatory aim but also restrict protected investor interests in the context of treaty provisions drafted at a high level of generality. In contrast to the other adjudication settings studied there are few examples of investment arbitrators performing a facilitative role and contributing to broader processes of dispute resolution. This reflects that in this context the disputing parties frequently do not have an ongoing relationship by the time of a final award and the purpose of adjudication is widely seen as obtaining an enforceable order for compensation.

Chapter Seven draws together the findings and implications of the comparative study undertaken. Overall, it suggests international adjudicators perform a number of crucial functions in contemporary international law by incrementally adapting the law, enforcing

treaty disciplines, and assisting disputing parties to resolve their disputes and rebuild their relationships. However, the analysis undertaken highlights a number of important limitations which affect how these functions might be discharged. For example, adjudicators typically lack the authorisation or legitimacy needed to undertake significant law-making or to themselves decide upon the relative importance of competing regulatory goals. Likewise, international adjudicators frequently do not have the familiarity with local circumstances or the specialist forms of expertise needed to second-guess domestic-level measures, or to fully dispose of a dispute. Careful comparative analysis, as I will demonstrate, can highlight avenues for adjudicators to learn from the practices developed in other institutional settings, and adapt their decision-making to address existing shortcomings and new social demands.

II. STUDY DESIGN AND METHODOLOGY

This chapter addresses several methodological issues relevant to justifying the design and approach of this study. Section A addresses a number of issues which from various perspectives concern how, in concrete terms, the focus of environmental cases has been delimited. It begins by explaining how this thesis relates to existing literature on international environmental adjudication and why the four adjudication contexts covered were focused on, as well as why certain regional adjudicatory or quasi-adjudicatory contexts were not covered. I then deal with the threshold issue of what counts as a case with an environmental component.¹ Section A also justifies several choices which have been made regarding the type of decisions analysed such as lines of case law which indirectly touch on environmental issues. Section B explains how this thesis has incorporated insights from methodological debates in comparative law. It also justifies the doctrinal nature of this study.

A. Issues of Case Selection

1. How this Thesis Relates to Existing Literature on International Environmental Adjudication

Existing international law literature concerning international environmental adjudication, such as well-known book-length accounts by Cesare Romano and Tim Stephens, is largely focused on the conditions under which international adjudication can act as an effective mechanism for protecting environmental interests.² This thesis has a different focus as it seeks to use environmental cases as a lens for reflecting back on the functions of international adjudicators, and specifically what this case law tells us about three key problems facing contemporary adjudicators – change, review of state conduct, and dispute resolution – and why adjudicators’ practices differ across institutional contexts. Nevertheless, it is important to briefly explain how my study relates to this body of literature.

¹ For my justification of the decision to use environmental cases as the lens for this study, given its aims, see above ch I, text at n 30ff.

² Cesare PR Romano, *The Peaceful Settlement of International Environmental Disputes: A Pragmatic Approach* (Kluwer Law International 2000) xlv, 30; Tim Stephens, *International Courts and Environmental Protection* (CUP 2009) 2.

Romano's study, completed in 2000, is largely devoted to a small number of 'classic' and well-known disputes arising from ICJ litigation and ad hoc interstate arbitration.³ In contrast, the focus of this thesis on environmental adjudication in the investment treaty, WTO, and UNCLOS contexts, as well as the ICJ, will allow me to provide an account of the functions of adjudicators which is more attentive to the variety of contexts in which contemporary adjudication occurs, and reveals significant opportunities for comparatively informed learning. My analysis also extends a key finding of Romano's, namely that adjudication can contribute to broader processes of dispute resolution, for example by clarifying key issues of law and fact.⁴ Specifically, I explain why we see the ICJ and ITLOS often performing this function in the environmental cases reviewed, and why WTO adjudication, given its institutional structure, should also be understood as facilitating a wider diplomatic process of dispute resolution. I also explain why there are few signs of investment treaty arbitrators performing a facilitative role, given the contextual features of that regime, and evaluate the potential for arbitrators to adopt such a role in future.

Stephens' study, completed in 2009, is understandably more attuned to the issue of fragmentation.⁵ Stephens emphasised the increasing tendency for environmental disputes to be litigated through international tribunals with a non-environmental focus, and the potential for this both to integrate environmental concerns into other bodies of law, and to produce problematic approaches to environmental issues.⁶ My analysis of investment treaty arbitration, which is largely overlooked by Stephens,⁷ complements his study. I explain how, across a large case load, investment arbitrators are scrutinising domestic regulatory measures which are typically based on specialised forms of expertise and strike a contestable balance between regulatory aims, such as environmental protection and protection of investor interests. I also explain why investment treaty arbitration exhibits, to varying degrees, a bias against change in the regulatory system of host states which threatens to prevent the adaption of environmental regulation to new demands. My analysis also extends Stephens' analysis of relevant WTO case law in light of a substantial

³ Romano also considers one early UNCLOS dispute, the *Southern Bluefin Tuna Cases*, discussed below Chapter IV.

⁴ Romano (n 2) 323-324.

⁵ See Stephens (n 2) chs 2, 9, 10.

⁶ Stephens (n 2) 355-356, 310-342.

⁷ See Stephens (n 2) 50, discussing in passing *Metalclad Corporation v United Mexican States (Award)* (ICSID Case No. ARB[AF]/97/1, 30 August 2000) discussed below ch VI.

number of cases litigated in that setting in recent years concerning measures pursuing environmental and other non-trade aims.⁸ Finally, whereas Stephens' account of the adjudicatory function is focused on the potential for adjudication to contribute to the implementation of environmental norms,⁹ I use a partly similar set of case law to intervene in more general debates concerning the functions of international adjudicators.

In 2010 Yasuhiro Shigeta published a study which must be addressed because of its fairly comprehensive scope – covering even more adjudicatory and quasi-adjudicatory settings than this thesis – and because it focuses on the standard setting, compliance control and law-development functions of international adjudicators in relation to environmental law.¹⁰ Shigeta draws on a political science-oriented compliance literature and is concerned with how international judicial and quasi-judicial procedures might be used to improve the effectiveness of international environmental law.¹¹ In contrast, this thesis is focused on what the mass of environmental case law, decided across various fora, tell us about the diverse functions of contemporary adjudicators and how those functions might be discharged.

This thesis also provides additional insights not covered by Shigeta. For example, Shigeta does not consider investment treaty arbitration, which has been the most active site of international adjudication, including for environmental cases, in recent years.¹² This reflects that Shigeta reasons that such tribunals are not international tribunals because they are created by an investor and a state.¹³ I fundamentally depart from this view. Shigeta's characterisation of investment treaty arbitration is only true in the superficial sense that in order for this adjudicatory mechanism to be used, an investor must accept a host state's offer to arbitrate by filing a claim. The crucial point is that the existence of a tribunal with jurisdiction is typically made possible by an agreement between states – an investment treaty – which contains a standing, generalised offer to arbitrate with covered

⁸ Compare the analysis below Chapter Three with Stephens (n 2) 324-339; Furthermore, I analyse a significant number of environmental disputes decided by ITLOS, UNCLOS arbitral tribunals, and the ICJ in the period since Stephens' study appeared.

⁹ Compare Stephens (n 2) 91-117.

¹⁰ Yasuhiro Shigeta, *International Judicial Control of Environmental Protection: Standard Setting, Compliance Control, and the Development of International Environmental Law by the International Judiciary* (Kluwer Law International 2010).

¹¹ See *ibid* 4, 8, 351.

¹² See below Ch VI, n 5-7 and text.

¹³ Shigeta (n 10) 27.

investors.¹⁴ Investor-state tribunals meet standard definitions of international tribunals, including that they are typically created by a treaty, decide cases where one party is a state, decide on the basis of international law, act in a judicial manner, and issue binding decisions.¹⁵ Thus they are widely seen as part of the broader field of international adjudication.¹⁶ Additionally, in relation to the key adjudicatory function of reviewing state compliance with international norms, Shigeta only considers one of the four adjudication mechanisms studied here, WTO adjudication, and, does not address in detail the crucial questions of the standard and method of review,¹⁷ an area where, as I will show, the potential for comparatively informed learning is particularly rich.

In recent years, another strand of scholarship has focused on the interaction between the international investment and environmental regimes. Much of this literature addresses the various, and not solely adjudicatory, aspects of the interaction between these two regimes¹⁸ in order to highlight how the investment regime, and its dispute settlement mechanisms, may impact upon states' ability to adopt environmental measures,¹⁹ and how investment law might be used to promote environmental interests.²⁰ I share with this literature the view that investment treaty arbitration has emerged as an important and highly active site of international environmental adjudication. Furthermore, the interaction between these two areas of law is likely to increase.²¹ Again, however, this thesis has a distinct focus, in that it uses environmental cases to draw conclusions about

¹⁴ See Gus Van Harten and Martin Loughlin, 'Investment Treaty Arbitration as a Species of Global Administrative Law' (2006) 17 EJIL 121, 126–9; Campbell McLachlan, Laurence Shore and Matthew Weiniger, *International Investment Arbitration: Substantive Principles* (OUP 2008) 4–5.

¹⁵ See Cesare PR Romano, 'A Taxonomy of International Rule of Law Institutions' (2011) 2 JIDS 241, 251–253.

¹⁶ See eg Cesare PR Romano, Karen J Alter and Yuval Shany, 'Mapping International Adjudicative Bodies, the Issues, and Players' in Cesare PR Romano, Karen J Alter and Yuval Shany (eds), *The Oxford Handbook of International Adjudication* (OUP 2014) 5, 11–12; Nienke Grossman, 'Legitimacy and International Adjudicative Bodies' (2009) 41 GWILR 107, 113–4.

¹⁷ See Shigeta (n 10) 185–253.

¹⁸ See especially Jorge E Viñuales, *Foreign Investment and the Environment in International Law* (CUP 2012).

¹⁹ See eg ibid chs 12–15; Saverio Di Benedetto, *International Investment Law and the Environment* (Edward Elgar Publishing 2013) chs 4–7; Kate Miles, *The Origins of International Investment Law: Empire, Environment and the Safeguarding of Capital* (CUP 2013); Kyla Tienhaara, *The Expropriation of Environmental Governance: Protecting Foreign Investors at the Expense of Public Policy* (CUP 2009); Andreas Kulick, *Global Public Interest in International Investment Law* (CUP 2012) ch 6.

²⁰ Pierre-Marie Dupuy and Jorge E Viñuales (eds), *Harnessing Foreign Investment to Promote Environmental Protection: Incentives and Safeguards* (CUP 2013); Marie-Claire Cordonier Segger, Markus W Gehring and Andrew Newcombe (eds), *Sustainable Development in World Investment Law* (Kluwer Law International 2011).

²¹ Viñuales (n 18) 1.

the varied roles performed by contemporary adjudicators, and accordingly analyses investment treaty arbitration in a wider comparative perspective.

2. Which Adjudicatory Bodies Are Not Covered?

The key international adjudicatory bodies which regularly hear environmental cases and are not considered by this thesis are regional human rights courts,²² and regional courts of economic integration.²³ This approach was adopted because such bodies are heavily tied to the specific and varied regional human rights or regional integration contexts in which they operate, and accordingly raise difficulties for comparative analysis which seeks to draw more general conclusions regarding contemporary international adjudication.²⁴ In some regions, such as Asia and the Pacific and the Middle East, there is strikingly little adjudication that occurs within regional human rights or regional integration frameworks.²⁵ Furthermore, where a tribunal is embedded within a strong regional integration or regional human rights project this can provide a basis for adjudicators engaging in certain tasks, such as invalidating national-level measures, or evaluating the importance of competing regulatory goals, which are much more controversial in regimes of global reach that do not enjoy any strong value-based consensus.²⁶ Nevertheless, an avenue to extend the findings of this study would be to incorporate analysis of regional adjudicatory bodies, which could provide further evidence of variation within the international legal order. Specific options for such further research will be outlined in Chapter Seven.

²² For overview of the case law of the various bodies see eg Shigeta (n 10) 61–115; Alan Boyle, ‘Human Rights and the Environment: Where Next?’ (2012) 23 EJIL 613; Philippe Sands and Jacqueline Peel, *Principles of International Environmental Law* (3rd edn, CUP 2012) 782–9.

²³ Regarding relevant European Court of Justice (ECJ) case law see Shigeta (n 10) 137–184; Sands and Peel, *ibid* 179–180; Stephens (n 2) 52–53.

²⁴ Similarly arguing that the ECJ and the European Court of Human Rights have to be understood in light of unique contextual factors and thus present a difficulty for comparative analysis: Karen J Alter, *The New Terrain of International Law: Courts, Politics, Rights* (Princeton University Press 2014) 106, 109; Jürgen Kurtz, ‘Adjudging the Exceptional at International Investment Law: Security, Public Order and Financial Crisis’ (2010) 59 ICLQ 325, 367–8.

²⁵ Alter, *ibid* 87, 97–8, 110.

²⁶ See *ibid* 282–328 (analysing an ‘international constitutional review’ role whereby courts invalidate national measures and suggesting this function is explicitly given to some courts of regional integration, and in practice has also been exercised by certain regional human rights courts and international criminal courts); Kurtz (n 24) 367–368.

In future it is possible that the International Criminal Court will hear environmental cases.²⁷ Recently, the Court's Office of the Prosecutor indicated that it would give particular consideration to prosecuting crimes within the Court's jurisdiction involving 'the destruction of the environment, the illegal exploitation of natural resources or the illegal dispossession of land'.²⁸ It should be noted that whereas all of the bodies considered in this thesis are concerned with determining state responsibility under international law, if the focus were shifted to determining individual criminal liability the key challenges facing adjudicators may be somewhat different.

This thesis also does not cover quasi-adjudicatory bodies which frequently hear disputes with an environmental component. For example, I do not cover the large number of conferences of the parties and their non-compliance mechanisms developed under multilateral environmental agreements,²⁹ human rights treaty bodies and their individual complaint mechanisms,³⁰ or the inspection procedures established within multilateral development banks to enable review of projects.³¹ As these bodies do not issue binding judgments, they do not meet a key criterion for being included within any definition of international tribunals³² and the related concept of international adjudication. Furthermore, these bodies are sometimes, as in the context of many environmental non-compliance mechanisms, designed to operate in manner that is markedly different from an adjudicatory role,³³ with members acting as representatives of states rather than in an independent manner,³⁴ reflecting the explicitly diplomatic and political nature of such

²⁷ For discussion of the environmental aspects of current international criminal law and possible reforms see Tara Smith, 'Creating a Framework for the Prosecution of Environmental Crimes in International Criminal Law' in William A Schabas, Yvonne McDermott and Niamh Hayes (eds), *The Ashgate Research Companion to International Criminal Law: Critical Perspectives* (Ashgate 2013).

²⁸ ICC OTP, 'Policy Paper on Case Selection and Prioritisation' (15 September 2016) [41].

²⁹ See eg Jan Klabbbers, 'Compliance Procedures' in Daniel Bodansky, Jutta Brunnée and Ellen Hey (eds), *The Oxford Handbook of International Environmental Law* (OUP 2008); Shigeta (n 10) 117-136; Stephens (n 2) 81-89.

³⁰ See above n 22.

³¹ See for overview and further references Sands and Peel (n 22) 167-8.

³² Romano (n 15) 254-5.

³³ See eg Convention on Access to Information, Public Participation in Decision-Making and Access to Justice in Environmental Matters (1998) 2161 UNTS 447, Art 15 (compliance mechanism intended to be 'non-confrontational, non-judicial and consultative'); Noting this is generally true of non-compliance mechanisms in environmental treaties: Cesare Pitea and Attila Tanzi, 'Non-Compliance Mechanisms: Lessons Learned and the Way Forward' in Tullio Treves et al (eds), *Non-Compliance Procedures and Mechanisms and the Effectiveness of International Environmental Agreements* (TMC Asser Press 2008) 569-570.

³⁴ Romano (n 15) 255, 260.

mechanisms.³⁵ While there is an established debate regarding the relative merits, in an environmental context, of quasi-adjudicatory compliance mechanisms as compared to traditional adjudication,³⁶ that is a different inquiry to the one undertaken by this thesis.

3. *What Constitutes an Environmental Case?*

This subsection addresses the threshold issue of how an environmental case has been defined, which is used as a focus to analyse the three pressing problems facing adjudicators across the four contexts studied. This thesis builds on the approach of existing international law contributions which suggest that it is preferable to focus on those disputes which can be said to have ‘an environmental or natural resources component’,³⁷ rather than focusing on the apparently environmental characteristics of the applicable law or institutional context.³⁸ As we will see repeatedly, disputes with an environmental component routinely arise under treaties and in institutions which might not be characterised as environmental. Furthermore, disputes with an environmental component require one to understand a range of other international legal issues.³⁹ This, of course, still raises the question of what counts as an environmental issue or component within a case and generally international lawyers have not spent a lot of time debating definitions of the environment.⁴⁰ At a simple level, the question might be answered intuitively based on experience in this area of law. For example, in the 2005 *Iron Rhine* Award the Tribunal noted that across international environmental law “‘environment” is broadly referred to as including air, water, land, flora and fauna, natural ecosystems and sites, human health and safety, and climate’.⁴¹ Similarly, as Alan Boyle and James Harrison note: ‘Most of what we generally regard as ‘environmental’ concerns pollution

³⁵ Klabbers (n 29) 998, 1008.

³⁶ Martti Koskeniemi, ‘Breach of Treaty or Non-Compliance? Reflections on the Enforcement of the Montreal Protocol’ (1992) 3 Ybk IEL 123; Klabbers (n 29); Alan Boyle and James Harrison, ‘Judicial Settlement of International Environmental Disputes: Current Problems’ (2013) 4 JIDS 245, 256–262.

³⁷ Philippe Sands, ‘Litigating Environmental Disputes: Courts, Tribunals and the Progressive Development of International Environmental Law’ in Tafsir Malick Ndiaye, Rüdiger Wolfrum and Chie Kojima (eds), *Law of the Sea, Environmental Law, and Settlement of Disputes* (Martinus Nijhoff 2007) 315, 319.

³⁸ Boyle and Harrison (n 36) 250; Ellen Hey, *Reflections on an International Environmental Court* (Kluwer Law International 2000) 4–5.

³⁹ Boyle and Harrison (n 36) 249. Hey, *ibid* 6–9.

⁴⁰ See eg the treatment of this specific issue in leading accounts of the sub-discipline: Sands and Peel (n 22) 13–15; Patricia Birnie, Alan Boyle and Catherine Redgwell, *International Law and the Environment* (3rd edn, CUP 2009) 4–6; Daniel Bodansky, *The Art and Craft of International Environmental Law* (Harvard University Press 2010) 9–11; Stephens (n 2) 346 (noting that ‘any precise categorisation of an “environmental case” is contentious’ and citing to a well-known definition from Bilder, which I criticise below); A more detailed treatment is provided by Romano (n 2) 15–24.

⁴¹ *Iron Rhine Arbitration (Belgium v Netherlands)* (2005) 140 ILR 130, [58].

of air, freshwater and oceans; climate change; unsustainable use of natural resources; loss of biodiversity, ecosystems and habitat; and conservation of endangered species and natural heritage.’⁴²

Understandings of the environment have ‘expanded rapidly over the past several decades’, shifting from compartmentalised to holistic approaches and increasingly incorporating social, cultural and economic factors.⁴³ Contemporary ecology suggests that the historically influential ‘distinction between “nature” and “human” is untenable’ because ‘[h]uman systems, such as economies, cultures, and politics, are subsystems nested within larger ecological and biogeochemical systems’.⁴⁴ Overall, the picture emerging from the vast literature on the question of what constitutes nature or the environment is one that increasingly decentres the human subject, and emphasises an ecocentric approach where humans are simply one part of wider ecosystems.⁴⁵ In basic terms, ecosystems consist of all the living organisms in a given area, including humans, and their interaction with their physical environment.⁴⁶ They can be studied at varying scales, ranging from the relatively specific – a forest or a lake – right up to the entire biosphere, consisting of all of the earth’s living organisms and their interactions with their physical environment.⁴⁷ Contemporary ecology emphasises that ultimately humans are part of a ‘highly interconnected biosphere’, with their activities having global effects.⁴⁸

This expansion in understandings of the environment means that more cases will potentially qualify as having an ‘environmental and natural resources’ component, and it is appropriate to reject certain definitions which have previously been advanced. For example, in a seminal contribution forty years ago, Richard Bilder defined international

⁴² Boyle and Harrison (n 36) 250; Similarly Birnie, Boyle and Redgwell (n 40) 6.

⁴³ See Lee Godden and Jacqueline Peel, *Environmental Law: Scientific, Policy and Regulatory Dimensions* (OUP 2010) 15–27.

⁴⁴ Jonathan Baert Wiener, ‘Law and the New Ecology: Evolution, Categories, and Consequences’ (1995) 22 *Ecology LQ* 325, 327, 349; Daniel B Botkin, *The Moon in the Nautilus Shell: Discordant Harmonies Reconsidered – From Climate Change to Species Extinction, How Life Persists in an Ever-Changing World* (OUP 2012) 324–5; Paul Robbins, John Hintz and Sarah A Moore, *Environment and Society: A Critical Introduction* (Wiley-Blackwell 2010) 3; Also noting this shift: Tuomas Kuokkanen, *International Law and the Environment: Variations on a Theme* (Brill 2002) 260–1.

⁴⁵ Romano (n 2) 19–20.

⁴⁶ Eugene P Odum, *Basic Ecology* (Saunders College Publishing 1983) 13; Robbins, Hintz and Moore (n 44) 185–6.

⁴⁷ Odum, *ibid* 4; Romano (n 2) 17.

⁴⁸ Judy L Meyer, ‘The Dance of Nature: New Concepts in Ecology’ (1993) 69 *Chicago-Kent LR* 875, 875, 886; Botkin (n 44) 187.

environmental disputes as disputes ‘relating to the alteration, through human intervention, of natural environmental systems’, deliberately seeking to focus on the natural rather than social environment.⁴⁹ Today it is much less clear that the sharp distinction between humans and nature within this definition can hold, particularly given the extent to which it has been demonstrated that what is seen as environmental issue is itself a loaded cultural construct.⁵⁰

Writing twenty-five years after Bilder, Romano defined an international environmental dispute as ‘[a] conflict of views or of interest between two or more States, ... relating to an anthropogenic alteration of an ecosystem, having detrimental effect on human society and leading to environmental scarcity of natural resources.’⁵¹ Part of Romano’s definition, specifically the focus on potential or realised detrimental effects of human-induced alterations of ecosystems, captures much of what is at stake in international disputes with an environmental component. Yet today the interstate limitation is not appropriate, for example given the massive number of investor-state arbitrations in recent years with some sort of environmental or natural resources component,⁵² and the jurisprudence developed by regional human rights courts concerning the environment.⁵³ His other restrictions – that the dispute concerns environmental scarcity as opposed to other types of scarcity, for example physical or socio-economic scarcity,⁵⁴ and that renewable, rather than non-renewable, resources are involved, the latter restriction being used to exclude oil concession arbitrations⁵⁵ – are also problematic. For example, a large number of investment treaty arbitrations in recent years have concerned non-renewable resources and raised the question of a state’s right to allocate the right to exploit such resources and the issue of resulting environmental damage.⁵⁶

⁴⁹ Richard Bilder, ‘The Settlement of Disputes in the Field of the International Law of the Environment’ (1975) 144 RdC 140, 153.

⁵⁰ Wiener (n 44) 348; See generally Neil Evernden, *The Social Creation of Nature* (The John Hopkins University Press 1992); Noel Castree, *Making Sense of Nature* (Taylor and Francis 2013).

⁵¹ Romano (n 2) 29.

⁵² In a recent survey which is not exhaustive, Viñuales categorised some 114 investor-state disputes with an environmental component, all but 12 of which were filed since the year 2000: Jorge E Viñuales, ‘Foreign Investment and the Environment in International Law: The Current State of Play’ in Kate Miles (ed), *Research Handbook on Environment and Investment Law* (Edward Elgar Publishing Forthcoming) <http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2661970>.

⁵³ See above n 22.

⁵⁴ Romano (n 2) 28–9.

⁵⁵ Ibid 27–8. Romano acknowledges that non-renewable resources may lead to the degradation of renewable resources, which is his focus: ibid 27.

⁵⁶ From many see eg *Crystallex and Cooper Mesa cases*, cited above Ch I, n 4; *Adel A Hamadi Al Tamimi v Sultanate of Oman (Award)* (ICSID Case No. ARB/11/33, 3 November 2015); *Quiborax SA and Non*

In selecting the case law to be covered, this thesis has sought to avoid overly restrictive definitions. The rationale for this is that, as explained in Chapter One, environmental cases were selected as a focus precisely because they are a prime example of the highly varied nature of contemporary international adjudication, and the professional versatility which this demands of international lawyers.⁵⁷ While inevitably focusing on disputes with an ‘environmental component’ leaves a degree of indeterminacy, this remains a far more rigorous approach than limiting one’s analysis to those disputes where the applicable law or institution might be characterised as environmental.⁵⁸ In order to address the indeterminacy concerning what constitutes an environmental component within a case, this present section considered contemporary debates regarding definitions of the environment. In all of the cases discussed, it is possible to say that at least part of what was at stake was an environmental issue or problem, in light of the contemporary understandings of that term considered above. Similarly, in all of the cases studied, at least one of the states involved claimed to have been acting, at least in part, to protect some sort of environmental interest. This is admittedly a broad definition and I will now justify some specific decisions which have been made regarding the case law discussed.

4. Specific Choices Regarding the Types of Decisions Discussed

This subsection justifies several specific choices which have been made regarding the types of adjudicatory decisions analysed, including lines of case law that indirectly touch on environmental issues. In recent years numerous disputes have arisen in the WTO and investment contexts concerning the legality of states’ programs to incentivise the shift towards clean energy sources.⁵⁹ While the state measures at issue in these cases have been partly aimed at implementing the shift to a clean energy economy, they have also sought to pursue other non-environmental goals, such as the creation of local industries and jobs, and the resulting case law has often concerned the legality of domestic content requirements and the conferral or removal of subsidies.⁶⁰ This has led some, including the

Metallic Minerals SA v Plurinational State of Bolivia (Award) (ICSID Case No. ARB/06/2, 16 September 2015); *Perenco Ecuador Ltd v Ecuador (Interim Decision on the Environmental Counterclaim)* (ICSID Case No. ARB/08/6, 11 August 2015).

⁵⁷ See above ch I, text at n 30ff.

⁵⁸ Boyle and Harrison (n 36) 250.

⁵⁹ See generally Daniel Behn and Ole Kristian Fauchald, ‘Governments Under Cross-Fire? Renewable Energy and International Economic Tribunals’ (2015) 12 Manchester JIEL 117 (also highlighting relevant EU law issues).

⁶⁰ In the investment context the first decided cases, which have both seen the investors’ claims rejected, are *Mesa Power Group, LLC v Canada (Award)* (PCA Case No. 2012-17, 24 March 2016); *Charanne B.V. and*

WTO Panel in the *Canada-Renewable Energy*, to observe that these cases are not really ‘trade and environment’ disputes, with the complaining parties having expressly acknowledged the legitimacy of the regulatory objective of transitioning to a cleaner economy and only challenged the trade-distortive aspects of such measures.⁶¹ Similarly, Boyle and Harrison argue in relation to such disputes that ‘the simple fact that a trade or investment dispute relates to an environmental industry does not make it an environmental dispute if there are no questions of environmental law or policy’ at issue.⁶² In contrast, writing in the investment context Jorge Viñuales includes in his definition of environmental cases disputes concerning ‘environmental markets’,⁶³ and sees ‘energy transition’ cases as part of the exponential increase in the number of environmental disputes in that regime.⁶⁴

This thesis takes the view that such renewable energy disputes, as they have arisen to date, have only incidentally been concerned with environmental considerations, which, for example, have explained the policy rationale behind measures to incentivise particular types of energy supply. For this reason, I do not focus heavily on such disputes. However, where my analysis is relevant to such disputes I will mention them. For example, in the investment context I explain how investment arbitrators determine the permissible degree of change in the host state’s regulatory system. Recent arbitral decisions suggest this issue is highly relevant to renewables cases, which have squarely concerned the host state’s ability to adjust regulation, given changing circumstances, to achieve its policy objectives, environmental and otherwise.⁶⁵ Similarly, in the WTO context, my analysis of necessity testing is relevant to renewables cases where, as existing decisions and commentary demonstrate, the use of this method of review is likely as adjudicators are

Construction Investments S.A.R.L v Spain (Award) (21 January 2016); For a relatively up to date list of pending cases see Viñuales (n 52); In the WTO context the Appellate Body has decided two such disputes: *Canada–Certain Measures Affecting the Renewable Energy Generation Sector*; *Canada–Measures Relating to the Feed-in Tariff Program–Reports of the Appellate Body* (6 May 2013) WT/DS412/AB/R, WT/DS426/AB/R; *India–Certain Measures Relating to Solar Cells and Solar Modules–Report of the Appellate Body* (16 September 2016) WT/DS456/AB/R; For discussion of several other WTO renewables cases or potential cases see Timothy Meyer, ‘How Local Discrimination Can Promote Global Public Goods’ (2015) 95 Boston University LR 1939, 1954–5.

⁶¹ *Canada-Renewable Energy*, *ibid*, Reports of the Panels (19 December 2012), [7.7].

⁶² Boyle and Harrison (n 36) 249, fn 22.

⁶³ Viñuales (n 18) 17.

⁶⁴ Viñuales (n 52).

⁶⁵ *Mesa* (n 60). Discussed below Ch VI, text at 122-124.

faced with scrutinising measures which pursue legitimate policy objectives but also restrict international trade.⁶⁶

Several choices also need to be justified regarding the law of the sea cases analysed. Where this thesis refers to ‘UNCLOS adjudication’ it means disputes where the relevant court or tribunal has been seised under the dispute settlement provisions of UNCLOS.⁶⁷ To date this means some thirty-odd cases split between the International Tribunal for the Law of the Sea, and arbitral tribunals constituted under Annex VII of the Convention.⁶⁸ While the ICJ is an option for disputes under UNCLOS,⁶⁹ it has never been seised under the Convention.⁷⁰ It is also a pre-existing institution which does not owe its existence to UNCLOS in the same way as ITLOS or arbitral tribunals do. The ICJ does hear maritime boundary delimitation cases where UNCLOS or equivalent aspects of custom are part of the applicable law, even though the Court is accessed on another jurisdictional basis.⁷¹ However, in any case, such disputes are not primarily concerned with environmental considerations.⁷² Accordingly, maritime boundary delimitation cases are not a focus for this thesis, although I will mention a few such disputes where they have a significant environmental component and are relevant to the issue being discussed.⁷³ Within the

⁶⁶ See eg *India–Solar Cells (AB)* (n 60) (domestic content measures found to violate GATT and TRIMS obligations, and AB considered availability of exceptions under GATT Art XX(j),(d)); Meyer (n 60) 2003–2011 (proposing a reformed version of necessity testing for such cases); Steve Charnovitz and Carolyn Fischer, ‘Canada–Renewable Energy: Implications for WTO Law on Green and Not-So-Green Subsidies’ (2015) 14 WTR 177, 188.

⁶⁷ United Nations Convention on the Law of the Sea (1982) 1833 UNTS 3, Art 287.

⁶⁸ ITLOS has registered twenty-five cases, however many are requests for provisional measures where an arbitral tribunal has jurisdiction over the merits: <<https://www.itlos.org/en/cases/list-of-cases/>>. Thus there is significant overlap with the thirteen cases where arbitral tribunals have been constituted under Annex VII of the Convention. The first such tribunal was *Southern Bluefin Tuna Cases (Australia and New Zealand v Japan) (Jurisdiction and Admissibility)* (2000) 119 ILR 508. The other twelve tribunals have all been administered by the Permanent Court of Arbitration and materials are available at: <<https://pca-cpa.org/en/services/arbitration-services/unclos/>>.

⁶⁹ UNCLOS, Art 287.

⁷⁰ Similarly: Barbara Kwiatkowska, ‘The World Court and Peaceful Settlement of Oceans Disputes’ in David Freestone, Richard Barnes and David Ong (eds), *The Law of the Sea: Progress and Prospects* (OUP 2006) 447–8.

⁷¹ *Maritime Delimitation in the Black Sea (Romania v Ukraine)* (Judgment) [2009] ICJ Rep 61 (jurisdiction through agreement of the parties); *Land and Maritime Boundary between Cameroon and Nigeria* (Preliminary Objections) [1998] ICJ Rep 275, [109] (jurisdiction under parties’ optional clause declarations); *Maritime Dispute (Peru v Chile)* (Judgment) [2014] ICJ Rep 3 (jurisdiction under regional treaty providing general acceptance of ICJ jurisdiction).

⁷² See, however, for a perspective embedding the delimitation exercise in a wider environmental context: *Maritime Delimitation in the Area between Greenland and Jan Mayen (Denmark v Norway)* (Judgment) [1993] ICJ Rep 38, Sep. Op. Weeramantry [235]–[244].

⁷³ In Chapter Four I consider a recent Provisional Measures Order of a Special Chamber of ITLOS, within the wider context of a delimitation dispute, which raised the issue of potential harm to the marine environment and is highly relevant to the dispute resolution role of adjudicators: *Delimitation of the*

context of UNCLOS adjudication, the issue of the standard and method of review is analysed through the lens of ITLOS' prompt release jurisprudence. Such cases are properly seen as environmental cases because they concern a coastal state's ability to take measures to conserve and manage living resources within its Exclusive Economic Zone, even though they also concern a flag state's interest in freedom of navigation.⁷⁴ As we will see, this body of case law has occurred within the context of the major conservation problem of illegal, unreported and unregulated fishing, and debate has often concerned how this context should inform adjudicators' review of coastal state measures.⁷⁵

Another consideration which must be explained is the type of adjudicatory decisions considered. The judgments or awards analysed are almost all from contentious cases. The ICJ and ITLOS also occasionally issue advisory opinions, three of which have raised environmental issues.⁷⁶ In Chapter Four I discuss an advisory opinion of ITLOS' Seabed Disputes Chamber because it is a striking example of adjudicators responding to changes in relevant legal norms and changes in facts which affect the application of such norms. Nevertheless, this thesis is focused on adjudication in a contentious setting. There are not enough environmental cases determined in an advisory setting to draw representative conclusions about this distinct role of some international courts.⁷⁷ Furthermore, some of the problems facing adjudicators which this thesis focuses on may not arise in a comparable way in an advisory setting. For example, the issues of the applicable standard and method of review may not be as pressing in an advisory context if a tribunal is

Maritime Boundary in the Atlantic Ocean (Ghana/Côte d'Ivoire) (ITLOS, Provisional Measures, Order of 25 April 2015) ITLOS Reports 2015, 146; In analysing the ICJ's dispute resolution role I discuss *Jan Mayen*, *ibid.*

⁷⁴ See below Ch IV(C).

⁷⁵ *Ibid.*

⁷⁶ *Legality of the Threat or Use of Nuclear Weapons* (Advisory Opinion) [1996] ICJ Rep 226, [29]-[33]; ITLOS' Seabed Disputes Chamber issued its first advisory opinion in 2011: *Responsibilities and Obligations of States Sponsoring Persons and Entities with respect to Activities in the Area* (Advisory Opinion, 1 February 2011) ITLOS Reports 2011, 10; In 2015 ITLOS, sitting as the whole tribunal, issued its first advisory opinion: *Request for Advisory Opinion submitted by the Sub-Regional Fisheries Commission* (Advisory Opinion, 2 April 2015), ITLOS Reports 2015, 4. Note that UNCLOS does not create an advisory jurisdiction for the full tribunal of ITLOS – as opposed to the Seabed Disputes Chamber – but allows other agreements, related to the purposes of the Convention, to confer advisory jurisdiction on ITLOS: [58]-[60].

⁷⁷ See, however, for a perspective emphasising the potential for the ICJ and ITLOS to contribute to resolving the problem of climate change through advisory opinions, by clarifying relevant legal obligations, settling factual disputes, raising public consciousness, and defining implementation measures: Philippe Sands, 'Climate Change and the Rule of Law: Adjudicating the Future in International Law' (2016) 28 JEL 19; Regarding the advisory function of the ICJ see generally Mahasen M Aljaghoub, *The Advisory Function of the International Court of Justice 1946 - 2005* (Springer 2006).

answering a question formulated in general terms rather than scrutinising specific conduct of a state. Similarly, the contribution of adjudicators to wider processes of dispute resolution would likely raise distinct issues in an advisory setting. With the exception of WTO dispute settlement, all of the adjudication bodies considered have the ability to issue provisional measures, as well as final judgments or awards. A few provisional measures decisions are discussed, in particular in Chapter Four in analysing UNCLOS adjudication, because some of ITLOS' most significant decisions concerning protection of the marine environment have occurred in a provisional measures context.⁷⁸ The fact that a decision occurs in a provisional measures setting is, however, a relevant contextual consideration and will be accounted for in my analysis.

B. The Methodology of this Study

In conducting its cross-regime analysis this thesis incorporates insights from methodological debates within comparative law scholarship. This is important because comparative law is a discipline focused on understanding similarities and differences between legal orders, and literature focused on comparing different international legal regimes has largely neglected the question of comparative methodology.⁷⁹ This study also reflects a doctrinal approach to studying international law which should be justified.

1. Methodological Insights from Comparative Law

This thesis seeks both to *identify* and *explain* significant similarities and differences regarding how the three pressing problems are managed by adjudicators across the four contexts studied. These are, in short, the traditional aims of comparative law,⁸⁰ and it is instructive to have regard to methodological debates in comparative law in so far as they may offer insights into the exercise of comparing different areas of international adjudication. Historically, the dominant approach to comparative law has been functionalism, which focuses on common functional problems and legal solutions

⁷⁸ A number of the ICJ cases analysed had provisional measures and/or jurisdictional phases prior to the final judgment being issued and I have considered these decisions in preparing my analysis.

⁷⁹ Similarly: Valentina Vadi, *Analogies in International Investment Law and Arbitration* (CUP 2015) 86.

⁸⁰ Jaakko Husa, 'Research Designs of Comparative Law – Methodology or Heuristics?' in Maurice Adams and Dirk Heirbaut (eds), *The Method and Culture of Comparative Law: Essays in Honour of Mark Van Hoecke* (Hart Publishing 2014) 53–4; Jaakko Husa, *A New Introduction to Comparative Law* (Hart Publishing 2015) 147.

developed across different contexts.⁸¹ According to a functionalist approach, the legal techniques of different societies can be compared where they fulfil similar functions, and every legal system ‘faces essentially the same problems, and solves these problems by quite different means though very often with similar results’.⁸² Functionalists claim that ‘comparative law can provide a much richer range of solutions’ than studies confined to a single legal system.⁸³ Functionalism, is the subject of substantial debate within comparative law scholarship, and key criticisms include that it ‘exaggerates the extent to which different societies face similar problems’, underemphasises the ‘cultural, economic, political and social context within which legal rules exist’, and cannot provide a basis for evaluating different legal solutions.⁸⁴ The key alternative to functionalism which exists in comparative law literature is cultural approaches, which emphasise that legal rules are inevitably heavily intertwined with their broader social, economic and cultural context, and at their strongest suggest that different legal systems are not comparable.⁸⁵

The perspective of this thesis is somewhat towards the functional end of the methodological spectrum,⁸⁶ in that the common yardsticks which structure my comparison are three pressing problems facing contemporary adjudicators, namely managing change, reviewing state conduct, and contributing to dispute resolution.⁸⁷ In order to address potential shortcomings of a functional approach this thesis analyses in significant detail contextual factors relevant to understanding each of the adjudication

⁸¹ Ralf Michaels, ‘The Functional Method of Comparative Law’ in Mathias Reimann and Reinhard Zimmermann (eds), *The Oxford Handbook of Comparative Law* (OUP 2006) 342; Christopher A Whytock, ‘Legal Origins, Functionalism, and the Future of Comparative Law’ [2009] Brigham Young ULR 1879, 1879; Konrad Zweigert and Hein Kötz, *Introduction to Comparative Law* (Tony Weir tr, OUP 1998) 34.

⁸² Zweigert and Kötz (n 81) 34; Michaels (n 81) 342; See also: A Esin Öricü, ‘Methodology of Comparative Law’ in Jan M Smits (ed), *Elgar Encyclopedia of Comparative Law* (2nd edn, Edward Elgar Publishing 2012) 561–3; Jaakko Husa, ‘Methodology of Comparative Law Today: From Paradoxes to Flexibility?’ (2006) 58 RIDC 1095, 1100–1105.

⁸³ Zweigert and Kötz (n 81) 15.

⁸⁴ Whytock (n 81) 1886–1887, 1897–8; Michaels (n 81) 374–5, 379–80; Seminally: Günter Frankenberg, ‘Critical Comparisons: Re-Thinking Comparative Law’ (1985) 26 HILJ 411, 412–440.

⁸⁵ Vadi (n 79) 31–3; Mathias Reimann, ‘The Progress and Failure of Comparative Law in the Second Half of the Twentieth Century’ (2002) 50 AJCL 671, 680–82; Annelise Riles, ‘Wigmore’s Treasure Box: Comparative Law in the Era of Information’ (1999) 40 HILJ 221, 240–249; Seminal examples of cultural approaches include: Frankenberg (n 84) 441–455; Pierre Legrand, ‘The Impossibility of Legal Transplants’ (1997) 4 MJ 111, 120–124.

⁸⁶ Vadi (n 79) 30 (noting all approaches fit somewhere on a sliding scale from the wholly functionalist to the purely cultural).

⁸⁷ In comparative law terms such a common yardstick is referred to as a *tertium comparationis*: see Husa, *Introduction* (n 80) 148–153.

settings studied.⁸⁸ Each chapter begins with an analysis of such factors, which include whether adjudication occurs within a wider cooperative regime with particular goals, whether other law-making processes within a regime are active, whether compulsory jurisdiction exists and which actors can access adjudication, the appointment arrangements for adjudicators, and the type of remedies typically utilised.⁸⁹ Attention to such contextual factors is, in fact, required by a functional approach because legal rules are viewed as culturally embedded, and the functions or goals of a legal institution, such as a court or tribunal, may be implicit⁹⁰ and become clear through attention to considerations such as the structure and procedure of a court.⁹¹ I will explain my findings of similarity or difference regarding adjudicators' practices in light of relevant contextual considerations.

Furthermore, there are reasons to think that the potential challenges of functionally inclined comparison are less significant when the object of comparison is aspects of different regimes or sub-branches of international law, rather than entirely different systems of national law.⁹² All of the adjudication settings compared belong to the same underlying legal culture of public international law,⁹³ even though they also have their own functional orientations, 'assumptions and biases'.⁹⁴ In comparative law terminology this comparison is horizontal, in that it compares adjudication mechanisms all operating

⁸⁸ See Vicki C Jackson, 'Comparative Constitutional Law: Methodologies' in Michel Rosenfeld and András Sajó (eds), *The Oxford Handbook of Comparative Constitutional Law* (OUP 2012) 72 (suggesting a 'contextualized functionalism' is possible and 'requires a willingness to question whether functions, concepts, or doctrines that appear similar may in fact be quite different' and to pay attention to how, within each legal system compared, 'seemingly separate institutions or legal practices are connected to, and influenced by, others').

⁸⁹ Also highlighting the importance of such factors: Jürgen Kurtz, 'The Merits and Limits of Comparativism: National Treatment in International Investment Law and the WTO' in Stephan W Schill (ed), *International Investment Law and Comparative Public Law* (OUP 2010) 250–254; Steven R Ratner, 'Regulatory Takings in Institutional Context: Beyond the Fear of Fragmented International Law' (2008) 102 AJIL 475, 485–6, 520–21; Philippa Webb, *International Judicial Integration and Fragmentation* (OUP 2013) 147–201.

⁹⁰ Michaels (n 81) 365.

⁹¹ Yuval Shany, 'Effectiveness of International Adjudication: Assessing Functions and Performance' (2014) 108 ASIL Proceedings 113, 114.

⁹² This reflects that the distances between legal systems are not equal, and the challenge of incommensurability is more pressing for some research questions – for example comparisons of entirely different legal traditions – than others: Vernon Valentine Palmer, 'From Leretholi to Lando: Some Examples of Comparative Law Methodology' (2005) 53 AJCL 261, 270.

⁹³ See especially Mario Prost, *The Concept of Unity in Public International Law* (Hart Publishing 2012) 159–160, generally ch 6 (suggesting international law exhibits a weak form of unity in the form of a shared internal legal culture amongst its professionals); Regarding legal culture as a variable in comparative law see Husa, 'Research Designs' (n 80) 59–60.

⁹⁴ Margaret A Young, 'Introduction: The Productive Friction between Regimes' in Margaret A Young (ed), *Regime Interaction in International Law: Facing Fragmentation* (CUP 2012) 11.

on the plane of international law, rather than introducing comparators with additional contextual variables from particular national or regional legal systems.⁹⁵ All of the sites of adjudication studied involve the common problem of international adjudicators determining state liability under international law, and predominantly specific treaties.⁹⁶ As noted in Chapter One, international adjudicators frequently engage in functionally minded comparison, drawing on approaches developed by other tribunals to analogous dilemmas, and much recent literature on international adjudication employs an explicitly comparative approach.⁹⁷

As to the scale of this study, it is closer to micro than a macro-comparison in comparative law terms in that it is focused on specific problems faced by adjudicators, the solutions developed in response, and the functions performed by adjudicators.⁹⁸ It is not a macro-comparison because I do not seek to compare, at a high level of generality, the entire sub-systems of international law in which each adjudicatory process is embedded.⁹⁹ Clearly, focusing on other aspects of contemporary adjudication may have produced different findings of similarity and difference.¹⁰⁰ However, as justified in detail in Chapter One, the three problems focused on were selected because they capture pressing problems facing international adjudication which are the subject of current debate. Functionalism is a constructive approach to law, in that it involves proposing hypotheses regarding the problems faced by legal systems and how they are responded to by legal institutions and doctrines. Accordingly, functional approaches, such as this study, should be judged according to their contribution to our understanding of the legal systems compared.¹⁰¹

⁹⁵ Husa, 'Research Designs' (n 80) 59; Regarding regional comparators see above n 24-26 and text. Similarly, national level comparators inevitably introduce factors that are specific to particular constitutional contexts and risk being selective: Caroline Henckels, *Proportionality and Deference in Investor-State Arbitration: Balancing Investment Protection and Regulatory Autonomy* (CUP 2015) 17–18.

⁹⁶ Henckels, *ibid* 12.

⁹⁷ See above Ch I, text at n 23-25, 138.

⁹⁸ On the distinction between micro and macro-comparison: Husa, *Introduction* (n 80) 101–2; Vadi (n 79) 137–8.

⁹⁹ *Ibid*.

¹⁰⁰ Michaels (n 81) 371–2.

¹⁰¹ *Ibid* 366, 373.

2. *The Approach to International Law Adopted in this Study*

The study is doctrinal in that to support my claims I make extensive reference to the judgments of adjudicators, and other relevant legal materials, even though it is not focused on a particular doctrine or rule of international law. This reflects certain choices I have made about how to answer the question posed. First, in a study focused on adjudication it is relevant that ‘international courts and tribunals are highly structured spaces of contestation’¹⁰² where legal arguments enjoy a privileged position.¹⁰³ In this setting it is expected that actors will relate their arguments to existing legal materials and utilise existing, if not wholly constraining, forms of legal reasoning.¹⁰⁴ For these reasons I felt it was crucial to support my arguments concerning the three pressing problems focused upon through detailed review of publicly available judgments and other relevant legal materials.¹⁰⁵

It is no doubt true that another disciplinary vocabulary may have offered alternative, complementary insights on the same or similar questions. For example, a historical approach might have focused on why adjudicators came to perform certain functions in a particular time and place, and situated these within a broader social and political context.¹⁰⁶ Others have sought to interview different international adjudicators about their roles,¹⁰⁷ and qualitative and quantitative empirical work on international adjudication, from traditions such as political science and sociology, is increasingly common.¹⁰⁸ Yet such interdisciplinary methods do not always provide a sufficiently fine-grained account of the specifically legal aspects of international adjudication,¹⁰⁹ or fully capture

¹⁰² David D Caron, ‘Towards a Political Theory of International Courts and Tribunals’ (2006) 24 Berkeley JIL 401, 411.

¹⁰³ Alter (n 24) 59.

¹⁰⁴ Armin von Bogdandy and Ingo Venzke, ‘On the Democratic Legitimation of International Judicial Lawmaking’ (2011) 12 German LJ 1341, 1344–45; Grossman (n 16) 149.

¹⁰⁵ Similarly: Gleider Hernandez, *The International Court of Justice and the Judicial Function* (OUP 2014) 283 fn 7 (Advocating studying the ICJ through its published judgments and working practices).

¹⁰⁶ Martti Koskenniemi, *The Gentle Civilizer of Nations: The Rise and Fall of International Law 1870–1960* (CUP 2001) 1–2; For recent historical work concerning adjudication see eg Martti Koskenniemi, ‘The Ideology of International Adjudication and the 1907 Hague Conference’ in Yves Daudet (ed), *Topicality of the 1907 Hague Conference, the Second Peace Conference* (Nijhoff 2008); Paolo Amorosa, ‘James Brown Scott’s International Adjudication between Tradition and Progress in the United States’ (2015) 17 JHIL 15.

¹⁰⁷ Daniel Terris, Cesare PR Romano and Leigh Swigart, *The International Judge: An Introduction to the Men and Women Who Decide the World’s Case* (OUP 2007).

¹⁰⁸ See eg Mark A Pollack, ‘Political Science and International Adjudication’ in Cesare PR Romano, Karen J Alter and Yuval Shany (eds), *The Oxford Handbook of International Adjudication* (OUP 2014); In the same volume, Erik Voeten, ch 25, ‘International Judicial Behaviour’.

¹⁰⁹ See Pollack, *ibid* 385 (concerning international relations work on adjudication).

international law as a predominantly practical and argumentative craft.¹¹⁰ This thesis takes the perspective that careful reflection on hard cases arising from the practice of international adjudication remains a productive line of inquiry, even if it is only one potential methodology.¹¹¹ The mass of international case law which has developed in recent years across different institutional contexts offers an important source of learning on key dilemmas facing international adjudicators,¹¹² reflecting that international tribunals have emerged as influential producers of legal knowledge.¹¹³

¹¹⁰ Martti Koskenniemi, 'Law, Teleology and International Relations: An Essay in Counterdisciplinarity' (2011) 26 *International Relations* 3, 19–20.

¹¹¹ See James Crawford and Penelope Nevill, 'Relations between International Courts and Tribunals: The "Regime Problem"' in Young (ed), *Regime Interaction in International Law* (n 94) 251–2 (suggesting beginning from the problems of practice teaches us quite a lot about international law as law).

¹¹² For this claim in relation to investment treaty arbitration see Frédéric Gilles Sourgens, *A Nascent Common Law: The Process of Decision-Making in International Legal Disputes between States and Foreign Investors* (Brill Nijhoff 2015) 8, 15; For a similar claim regarding WTO jurisprudence see John H Jackson, *Sovereignty, the WTO, and Changing Fundamentals of International Law* (CUP 2006) 135–6; Earlier Hersch Lauterpacht had already made this point when reflecting on the lessons contained in the body of international arbitral awards and the existing work of the International Court: Hersch Lauterpacht, *The Development of International Law by the International Court* (Revised ed, Stevens & Sons 1958) 17–18, 26–37.

¹¹³ Benedict Kingsbury, 'International Courts: Uneven Judicialisation in Global Order' in James Crawford and Martti Koskenniemi (eds), *The Cambridge Companion to International Law* (CUP 2012) 219.

III. DISPUTE SETTLEMENT IN THE WORLD TRADE ORGANIZATION

This chapter concerns the dispute settlement system (DSS) created within the World Trade Organization (WTO), often regarded as the most significant aspect of the WTO,¹ and, at least by trade lawyers, the most significant site of adjudication in wider public international law.² WTO adjudication is highly relevant to this thesis because alongside investment treaty arbitration it is one of the most active sites of international adjudication, and routinely decides environmental cases. This chapter proceeds as follows. Section A analyses numerous features of institutional context relevant to understanding the role of adjudication in this regime. Section B analyses how WTO adjudicators have managed the problem of changes in international law or changes in facts. Section C analyses how WTO adjudicators have managed the interrelated problems of the appropriate standard and method of review. Section D considers how WTO adjudicators have contributed to processes of dispute resolution in key environmental disputes arising in this context. Section E consolidates the findings of this chapter by drawing a series of conclusions regarding how contextual features of WTO adjudication shape the practices analysed. Relatedly, I consider the extent to which the practices observed provide insights into wider problems faced by international adjudicators and legal techniques that are potentially transferable to other contexts.

It is initially important to justify the type of WTO disputes discussed. In analysing the problem of the standard of review I focus on disputes arising under the Agreement on the Application of Sanitary and Phytosanitary Measures (SPS Agreement).³ While the issue of the standard review raises distinct issues under the various WTO covered agreements,⁴

¹ John H Jackson, *Sovereignty, the WTO, and Changing Fundamentals of International Law* (CUP 2006) 135; Joseph HH Weiler, 'The Rule of Lawyers and the Ethos of Diplomats: Reflections on the Internal and External Legitimacy of WTO Dispute Settlement' (2001) 35 JWT 191, 191.

² See eg David Palmeter and Petros C Mavroidis, *Dispute Settlement in the World Trade Organization: Practice and Procedure* (2nd edn, CUP 2004) 16, 234, 305; Jackson (n 1) 135.

³ Agreement on the Application of Sanitary and Phytosanitary Measures, Marrakesh Agreement Establishing the World Trade Organisation, Annex 1A (1994) 1867 UNTS 493 ('WTO Agreement').

⁴ See generally Claus-Dieter Ehlermann and Nicolas Lockhart, 'Standard of Review in WTO Law' (2004) 7 JIEL 491, 503–19; Outside the specific context of anti-dumping disputes, WTO law does not contain provisions which explicitly determine the appropriate standard of review, and the issue has been addressed by adjudicators relying on their power to make 'an objective assessment of the matter' before them under Article 11 of the Understanding on Rules and Procedures Governing the Settlement of Disputes, WTO Agreement, Annex 2 (1994) 1869 UNTS 401 ('DSU'). See *European Communities–Measures Affecting Meat and Meat Products (Hormones)–Report of the Appellate Body* (16 January 1998) WT/DS26/AB/R, WT/DS48/AB/R, [114]–[118]; The debate concerns the appropriate intensity of review 'for facts and decisions based on facts', as it is clear that, outside of the specialised anti-dumping context, WTO adjudicators are entitled to engage in full de novo review on determinations of WTO law: Benedikt Pirker,

focusing on the SPS context is justified because the issue has been given the most attention under this Agreement, reflecting that more than other contexts, SPS cases have presented adjudicators with contested, factually complex scientific claims.⁵ The SPS discourse, because it is comparatively well developed, has the potential to inform approaches to the standard of review in other settings where international adjudicators also face ‘fact-intensive’ environmental disputes.⁶ For example, in Chapter Four we will see that the ICJ in the *Whaling* case had regard to this aspect of WTO practice.⁷

In analysing the methods of review utilised in WTO environmental adjudication I focus on disputes arising under the General Agreement on Tariffs and Trade (GATT),⁸ the Agreement on Technical Barriers to Trade (TBT Agreement),⁹ and the SPS Agreement.¹⁰ This focus is justified because environmental cases are frequently litigated in these contexts and adjudicators have addressed in considerable detail the question of the appropriate method of review when faced with measures that purportedly pursue legitimate environmental interests but also restrict other protected (trade) interests. In analysing the contribution of WTO adjudicators as ‘dispute resolvers’ I focus on aspects of the case law developed under the ‘chapeau test’ which must be satisfied to rely upon the GATT Article XX exceptions. Clearly, there are other areas of WTO practice where adjudication contributes to broader processes of dispute resolution. However, my focus is justified because many commentators have claimed that aspects of the ‘chapeau test’ as applied in prominent environmental cases, such as *US-Gasoline*¹¹ and *US-Shrimp*,¹²

Proportionality Analysis and Models of Judicial Review: A Theoretical and Comparative Study (Europa Law Publishing 2013) 287; Ehlermann and Lockhart, *ibid* 497-9.

⁵ Lukasz Gruszczynski, ‘Standard of Review of Health and Environmental Regulations by WTO Panels’ in Geert Van Calster and Denise Prévost (eds), *Research Handbook on Environment, Health and the WTO* (Edward Elgar Publishing 2013) 732.

⁶ Jacqueline Peel, ‘Of Apples and Oranges (and Hormones in Beef): Science and the Standard of Review in WTO Disputes under the SPS Agreement’ (2012) 61 ICLQ 427, 458; Also suggesting that other international tribunals learn from the approach developed by WTO adjudicators in SPS disputes: Makane Moïse Mbengue and Rukmini Das, ‘The ICJ’s Engagement with Science: To Interpret or Not to Interpret?’ (2015) 6 JIDS 568, 575-6; Jürgen Kurtz, *The WTO and International Investment Law: Converging Systems* (CUP 2016) 151-3.

⁷ *Whaling in the Antarctic (Australia v Japan, New Zealand intervening)* (Judgment) [2014] ICJ Rep 226. Discussion below Ch V(C)(1).

⁸ General Agreement on Tariffs and Trade (1994), WTO Agreement, Annex 1A (1994) 1867 UNTS 190.

⁹ Agreement on Technical Barriers to Trade, WTO Agreement, Annex 1A (1994) 1868 UNTS 120.

¹⁰ SPS Agreement.

¹¹ *United States-Standards for Reformulated and Conventional Gasoline-Report of the Appellate Body* (29 April 1996) WT/DS2/AB/R.

¹² *United States-Import Prohibition of Certain Shrimp and Shrimp Products-Report of the Appellate Body* (12 October 1998) WT/DS58/AB/R; *United States-Import Prohibition of Certain Shrimp and Shrimp Products-Report of the Appellate Body (Art 21.5)* (22 October 2001) WT/DS58/AB/RW.

represent a desirable form of adjudicatory review, whereby adjudicators encourage regulating states to pursue a cooperative or multilateral solution but leave the parties some scope to resolve their dispute. This thesis builds on such claims because in addition to analysing the relevant WTO practices in a contextually sensitive manner, it analyses comparable developments in the other adjudication contexts studied.

A. Institutional Context for WTO Dispute Resolution

1. The Goals of the WTO DSS

Article 3 of the Dispute Settlement Understanding (DSU) is the starting point for understanding the goals of the DSS.¹³ One explicit goal, reflected in Article 3.2 of the DSU is to provide ‘security and predictability to the multilateral trading system’.¹⁴ The ultimate goal of providing security and predictability to the multilateral trading system can be broken into several more concrete intermediate goals, namely providing clear and coherent interpretations of WTO law, inducing compliance with WTO norms, and curbing unilateral actions that could harm the security of the system.¹⁵ One of the most important aims of the DSS, based on its negotiating history and practice, is curbing unilateralism, and in particular preventing unilateral determinations of illegality or unilaterally imposed sanctions.¹⁶ As we will see below, the DSS is notable for having a detailed and compulsory set of procedures for determining disputes over compliance.

Article 3.2 further provides that the DSS ‘serves to preserve the rights and obligations of Members under the covered agreements, and to clarify the existing provisions of those agreements’.¹⁷ WTO adjudicators play an important role in ‘interpreting ambiguities and filling gaps in the agreements’.¹⁸ However, the remaining parts of Article 3.2 regulate how this task is undertaken. WTO adjudicators are instructed to apply ‘customary rules of interpretation of public international law’,¹⁹ which potentially represents an attempt to

¹³ Yuval Shany, *Assessing the Effectiveness of International Courts* (OUP 2014) 191.

¹⁴ DSU, Art 3.2.

¹⁵ Sivan Shlomo-Agon, ‘Is Compliance the Name of the Effectiveness Game? Goal-Shifting and the Dynamics of Judicial Effectiveness at the WTO’ (2016) 15 WTR 671, 678.

¹⁶ See especially Petros C Mavroidis, ‘Dispute Settlement in the WTO: Mind over Matter’ (2016) (EUI Working Paper RSCAS 2016/04) <http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2727131>; Shlomo-Agon (n 15) 681.

¹⁷ DSU, Art 3.2.

¹⁸ Shany (n 13) 195; Shlomo-Agon (n 15) 678, 680–81.

¹⁹ DSU, Art 3.2

foreclose an expansive, teleological approach to interpretation.²⁰ More concretely, the final sentence of Article 3.2 states that '[r]ecommendations and rulings of the DSB [(Dispute Settlement Body)] cannot add to or diminish the rights and obligations provided in the covered agreements'.²¹ Relatedly, Article 3.9 provides that the provisions of the DSU 'are without prejudice to the rights of Members to seek authoritative interpretation of provisions of a covered agreement through decision-making under the WTO Agreement'.²² The WTO Agreement provides that the Ministerial Conference and General Council, bodies consisting of representatives of all WTO members, 'have the exclusive authority to adopt interpretations' of the Agreement, by three-fourths majority.²³ In short, WTO members have retained their normal ability to adopt authoritative interpretations of their agreements, notwithstanding the authorisation of adjudicators to interpret those agreements where disputes arise. Also consistent with the standard public international law position, the AB has held that adopted panel and AB reports create 'legitimate expectations among WTO Members' and need to be 'taken into account', but are not strictly binding beyond the parties to the dispute and do not constitute subsequent treaty practice.²⁴

Another goal with explicit support in multiple parts of Article 3 of the DSU is that of settling disputes.²⁵ Under Article 3.7, 'the aim of the dispute settlement mechanism is to secure a positive solution to a dispute'.²⁶ The provision further states that '[a] solution mutually acceptable to the parties to a dispute and consistent with the covered agreements is clearly to be preferred.' Article 3.3 also refers to 'the prompt settlement of situations', and the DSS is notable, as compared to other international tribunals, for establishing explicit time frames for the duration of proceedings.²⁷ Given this strong basis in treaty text, WTO adjudicators have highlighted that settling disputes is the primary aim of the

²⁰ Jan Klabbbers, 'On Rationalism in Politics: Interpretation of Treaties and the World Trade Organization' (2005) 74 *Nordic JIL* 405, 412; Armin von Bogdandy, 'Law and Politics in the WTO—Strategies to Cope with a Deficient Relationship' (2001) 5 *Max Planck Ybk UN Law* 609, 617.

²¹ DSU, Art 3.2; But see Klabbbers (n 20) 413–4 (development of the law through interpretation is inevitable whatever 'the WTO tries to tell its Member[s]').

²² DSU, Art 3.9.

²³ WTO Agreement, Art IX:2.

²⁴ *Japan—Taxes on Alcoholic Beverages—Report of the Appellate Body* (4 October 1996) WT/DS8/AB/R, WT/DS10/AB/R, WT/DS11/AB/R, 13–14; *US—Shrimp (Art 21.5)* (n 12) [108]–[109].

²⁵ See DSU, Arts 3.3, 3.4, 3.7.

²⁶ DSU, Art 3.7.

²⁷ See DSU, Art 20 (unless otherwise agreed the period from establishment of panel to consideration of report for adoption by DSB not to exceed nine months where a panel report is not appealed, or 12 months if appealed). See also Arts 12.8–12.9, 17.5.

DSS.²⁸ However, certain restrictions are placed on the goal of settling disputes, including that solutions agreed between the parties, and recommendations and rulings of the DSB, must be consistent with the covered agreements.²⁹

Two further goals find some support in Article 3, and are both more WTO-specific and more debated. The first is the goal of maintaining and re-establishing the balance of trade concessions between WTO members.³⁰ Article 3.3, mentioned above, states that:

The prompt settlement of situations in which a Member considers that any benefits accruing to it directly or indirectly under the covered agreements are being impaired by measures taken by another Member is essential to the effective functioning of the WTO and the maintenance of a proper balance between the rights and obligations of Members.³¹

This goal reflects an idea from the GATT era, which has been carried forward into the WTO, that at the heart of the system lies not only the legal rights and obligations contained in the WTO agreements, but also an additional set of trade concessions exchanged between members at the time of entry, and this balance must be maintained.³² This goal also finds some support in the WTO system of remedies, under which, as explained below, as a last resort, when a measure found to be inconsistent with a covered agreement has not been brought into compliance, a party who invoked the dispute settlement procedures can request authorisation to suspend the application of equivalent trade concessions.³³ A second contested goal of the DSS is that of inducing compliance with WTO norms.³⁴ Article 3.7 of the DSU states that ‘in the absence of a mutually agreed solution, the first objective of the dispute settlement mechanism is usually to secure the withdrawal of’ measures which are found to be inconsistent with the covered agreements.³⁵ However, debates concerning WTO remedies, and specifically the final

²⁸ See *European Communities–Regime for the Importation, Sale and Distribution of Bananas–Report of the Panel* (22 May 1997) WT/DS27/R/ECU, [7.32] (the WTO dispute settlement system is ‘first and foremost ... designed to settle disputes’); *United States–Measure Affecting Imports of Woven Wool Shirts and Blouses from India–Report of the Appellate Body* (25 April 1997) WT/DS33/AB/R, 19.

²⁹ See DSU, Art 3.4, 3.5; On the potential tension between the goal of settling disputes and other goals of the DSS, such as clarifying the law for the benefit of the wider membership and ensuring compliance with WTO law, see Jackson (n 1) 146; Shlomo-Agon (n 15) 680.

³⁰ Shany (n 13) 193–4; Shlomo-Agon (n 15) 678–9.

³¹ DSU, Art 3.3

³² See for a clear explanation: Joost Pauwelyn, ‘Enforcement and Countermeasures in the WTO: Rules Are Rules-Toward a More Collective Approach’ (2000) 94 AJIL 335, 339–340.

³³ DSU, Arts 22.2, 22.4;

³⁴ See Shany (n 13) 195–6; Shlomo-Agon (n 15) 680.

³⁵ DSU, Art 3.7.

option of suspending trade concessions, have highlighted that there is considerable disagreement over whether the DSS has the aim of inducing compliance with WTO obligations, or continues to operate according to the more limited GATT-logic of restoring the balance of trade concessions.³⁶

The DSS should also be understood in light of the broader goals of the WTO, reflecting the ‘regime support’ function of international tribunals embedded within wider functional regimes.³⁷ The goals of the WTO include raising living standards, ‘ensuring full employment and a large and steadily growing volume of real income and effective demand, and expanding the production of and trade in goods and services, while allowing for the optimal use of the world’s resources in accordance with the objective of sustainable development’, and protecting the environment.³⁸ Explicit recognition is given to the ‘need for positive efforts designed to ensure that developing countries, and especially the least developed among them, secure a share in the growth in international trade commensurate with the needs of their economic development’.³⁹ Tariff reduction, and the removal of other barriers to trade, are framed as a means for contributing to the above-mentioned objectives.⁴⁰ The WTO Agreement also aims to ‘develop an integrated, more viable and durable multilateral trading system’,⁴¹ and the DSS is recognised within key provisions of the DSU as central to the wider Organization.⁴² A related function of the DSS is to confer legitimacy on the WTO and its underlying norms in relation to both WTO members and external constituencies, for example by resolving disputes in an independent and principled manner rather than on the basis of the relative power of the members involved, providing detailed reasons for its decisions, and addressing the concerns of civil society.⁴³ As Sivan Shlomo-Agon highlights, this function is reflected

³⁶ See eg Shany (n 13) 210–211 (succinct overview of the debate); Joost Pauwelyn, ‘The Calculation and Design of Trade Retaliation in Context: What is the Goal of Suspending WTO Obligations’ in Chad P Brown and Joost Pauwelyn (eds), *The Law, Economics and Politics of Retaliation in WTO Dispute Settlement* (CUP 2010) (reviewing the debate and arguing the mechanism of WTO retaliation has multiple goals, despite a gradual evolution from rebalancing concessions to rule compliance); David Palmeter and Stanimir A Alexandrov, ‘“Inducing Compliance” in WTO Dispute Settlement’, *The Political Economy of International Trade Law: Essays in Honor of Robert E. Hudec* (CUP 2002) (arguing the system does not aim to induce compliance but merely to rebalance concessions).

³⁷ See above ch 1, text at n 94; Shany (n 13) 192; Shlomo-Agon (n 15) 679.

³⁸ WTO Agreement, preamble, para 1.

³⁹ Ibid preamble, para 2.

⁴⁰ Ibid preamble, para 3.

⁴¹ Ibid preamble, para 4.

⁴² See DSU, Art 3.2, 3.3; See also text at above n 16.

⁴³ Shany (n 13) 193; Shlomo-Agon (n 15) 679–680; Weiler (n 1) 204.

in the practice of WTO adjudicators, in controversial trade linkage disputes, of adding explanatory paragraphs which are not crucial to the legal reasoning but address the concerns of external constituencies.⁴⁴

2. Other Institutional Features of WTO Dispute Settlement Relevant to this Study

a) The Shift to Compulsory Jurisdiction and the Creation of Wide-Ranging Appellate Jurisdiction

A crucial difference between the WTO DSS and its GATT predecessor is the shift from a consensus requirement under the GATT to a ‘reverse-consensus’ model in the WTO. Whereas in the GATT it was possible to block the establishment of a panel, in the WTO ‘there is effectively a right to have a panel established’,⁴⁵ since the Dispute Settlement Body (DSB) – comprised of all WTO members⁴⁶ – can only block such establishment by consensus, which the complaining party can prevent. Furthermore, whereas the GATT system required consensus for the adoption of panel reports,⁴⁷ in the WTO the adoption of panel and Appellate Body (AB) reports can only be prevented by consensus,⁴⁸ which a victorious member can prevent.⁴⁹ In short, there is a system of compulsory jurisdiction.⁵⁰ The shift from the GATT to the WTO saw the creation of a standing Appellate Body to hear appeals from panel reports.⁵¹ An appeal is permitted on ‘issues of law covered in the panel report and legal interpretations developed by the panel’.⁵² The breadth of this appeal mechanism is unusual in wider international law, where often there is no appeal mechanism, as in the ICJ or UNCLOS adjudication, or only challenge to adjudicatory decisions on very narrow bases, as in investment treaty arbitration.⁵³ As explained next, this institutional feature produces certain dynamics.

⁴⁴ Sivan Shlomo-Agon, ‘Clearing the Smoke: The Legitimation of Judicial Power at the WTO’ (2015) 49 JWL 539, 583–5.

⁴⁵ Jackson (n 1) 153.

⁴⁶ See WTO Agreement, Art IV:2-3.

⁴⁷ Jackson (n 1) 156.

⁴⁸ See DSU, Arts 16(4), 17(14).

⁴⁹ The reverse consensus requirement also applies where a member requests authorisation from the DSB to suspend trade concessions after another member has failed to comply with a DSB ruling: DSU, Arts 22.2, 22.6.

⁵⁰ See DSU, Art 23 (members must resolve their disputes concerning the covered agreements through the dispute settlement procedures established in the DSU, and cannot make unilateral determinations that a violation has occurred).

⁵¹ DSU, Art 17(1); See Jackson (n 1) 156.

⁵² DSU, Art 17(6).

⁵³ Jackson (n 1) 156; See also Elihu Lauterpacht, *Aspects of the Administration of International Justice* (Grotius Publications 1991) 99–112 (on the limited nature of appeal mechanisms in international law); The

b) *The Missing Legislator in WTO Law*⁵⁴

In practice, the WTO combines an extremely active, and hierarchically unified, adjudicatory mechanism with little in the way of political procedures that can correct the decisions of adjudicators.⁵⁵ The provision for authoritative interpretation by three-fourths majority has not been used,⁵⁶ as the General Council and Ministerial Conference continue to operate via consensus.⁵⁷ The result is that despite the formal legal situation, de facto the WTO Appellate Body can authoritatively shape the meaning of the covered agreements through its decision-making.⁵⁸ While WTO treaty law has stood still in many areas, the case law that gives meaning to it has continued to develop apace.⁵⁹ At the most recent WTO Ministerial Conference in December 2015, although decisions were adopted on a few limited matters, ministers acknowledged the existence of significant disagreement amongst members regarding how to progress the current ‘Doha’ round of negotiations, initiated in 2001.⁶⁰

The de facto authoritative role of the AB in interpreting WTO law leads to certain dynamics which are worth noting. First, it is routine for a successful complainant to appeal a panel report if its reasoning has ‘long-range implications’ that the appellant dislikes.⁶¹ Given that a panel report will, to some degree, stabilise future expectations about what the law means,⁶² an appellant does not want to be stuck with reasoning it does not like. A related aspect of WTO practice is the routinely exercised right of non-disputing members to intervene, both at the panel stage and on appeal.⁶³ Again, this highlights that the outcomes of WTO adjudication have a wider significance for all members in terms of

limited scope for review of arbitral awards in the investment context is discussed below Ch VI, text at n 23-25.

⁵⁴ Armin von Bogdandy and Ingo Venzke, *In Whose Name? A Public Law Theory of International Adjudication* (OUP 2014) 134 (discussing ‘the missing international legislator’).

⁵⁵ See von Bogdandy (n 20) 616, 625, 633; Jackson (n 1) 159.

⁵⁶ Isabelle Van Damme, *Treaty Interpretation by the WTO Appellate Body* (OUP 2009) 26–30.

⁵⁷ Weiler (n 1) 201; von Bogdandy (n 20) 632–3.

⁵⁸ Weiler (n 1) 201; Van Damme (n 56) 26–7.

⁵⁹ See eg Aaron Cosbey and Petros C Mavroidis, ‘Heavy Fuel: Trade and Environment in the GATT/WTO Case Law’ (2014) 23 *RECIEL* 288, 289, 300; Ingo Venzke, *How Interpretation Makes International Law: On Semantic Change and Normative Twists* (OUP 2012) ch iv, esp. 168, 190-1.

⁶⁰ WTO, Nairobi Ministerial Declaration (21 December 2015) WT/MIN(15)/DEC, esp. [30].

⁶¹ Jackson (n 1) 156.

⁶² See von Bogdandy and Venzke (n 54) 206, 105–8.

⁶³ Third parties ‘having a substantial interest in a matter’ who notify the DSB have an opportunity to make submissions and be heard: DSU, Arts 10.2, 17.4.

the evolving GATT/WTO *acquis*.⁶⁴ Finally, a unique aspect of WTO adjudication is the provision for WTO members to express their views on panel and Appellate Body reports during meetings of the DSB,⁶⁵ despite the fact that adoption of such reports is a formality given the reverse-consensus rule. In practice WTO members have used this mechanism to register their dissatisfaction with Appellate Body decisions,⁶⁶ and it represents an important aspect of political influence over the adjudication mechanism.⁶⁷

c) The Adjudicators in WTO Dispute Settlement

WTO panels are constituted by three members who are appointed on an ad hoc basis.⁶⁸ The WTO Secretariat proposes nominations to the disputing parties and while strictly the parties can only oppose nominations ‘for compelling reasons’,⁶⁹ in practice this operates as a right of veto.⁷⁰ Where the disputing parties cannot agree on panellists within 20 days of the establishment of a panel, the WTO Director-General can, when requested by a party, appoint the panellists.⁷¹ WTO insiders emphasise that the disputing parties are always consulted prior to candidates being proposed by the Secretariat, and that, even where the Director-General appoints the panel, the process remains driven by their preferences.⁷² Individuals who are nationals of the parties to a dispute, or a third party, cannot serve as panellists without the agreement of the parties,⁷³ and this largely excludes nationals of states who are frequently parties to WTO disputes.⁷⁴ In contrast in particular to investment arbitration, but also UNCLOS arbitration and ad hoc judges in the ICJ and ITLOS, there is no ability in the WTO for adjudicators to be appointed by one of the

⁶⁴ Sungjoon Cho, *The Social Foundations of World Trade: Norms, Community and Constitution* (CUP 2014) 132–134; *Japan–Alcoholic Beverages* (n 24) 14.

⁶⁵ DSU, Arts 16.4, 17.14.

⁶⁶ For example, after the AB upheld a panel’s right to accept amicus briefs from non-governmental sources in *US–Shrimp* numerous WTO members heavily criticised the AB, arguing it had exceeded its mandate: *US–Shrimp* (n 12) [99]–[110]; WTO DSB, Minutes of Meeting (9 October 1998) WT/DSB/M/50, 1–18.

⁶⁷ Shany (n 13) 204; Gregory Shaffer, Manfred Elsig and Sergio Puig, ‘The Law and Politics of WTO Dispute Settlement’ in Wayne Sandholtz and Christopher A Whytock (eds), *Handbook on the Politics of International Law* (Edward Elgar forthcoming) 9 <<http://ssrn.com/abstract=2748883>>.

⁶⁸ See DSU, Art 8.5.

⁶⁹ DSU, Art 8.6

⁷⁰ Joost Pauwelyn, ‘The Rule of Law without the Rule of Lawyers? Why Investment Arbitrators Are from Mars, Trade Adjudicators from Venus’ (2015) 109 AJIL 761, 784, fn 133.

⁷¹ DSU, Art 8.7.

⁷² Reto Malacrida, ‘WTO Panel Composition: Searching Far and Wide for Administrators of World Trade Justice’ in Gabrielle Marceau (ed), *A History of Law and Lawyers in the GATT/WTO: The Development of the Rule of Law in the Multilateral Trading System* (CUP 2015) 314, 317.

⁷³ DSU, Art 8.3.

⁷⁴ Pauwelyn, ‘Rule of Law’ (n 70) 789.

disputing parties.⁷⁵ The WTO Secretariat maintains an indicative list of potential panellists, to which members can add qualified persons,⁷⁶ but there is no requirement that panellists come from this list, and many do not.⁷⁷ The typical background of a WTO adjudicator is overwhelmingly that of someone with significant government experience and a law degree.⁷⁸

The Appellate Body is a standing body composed of seven persons, three of whom serve on any one case, in a system of rotation which prevents litigants choosing the adjudicators who hear their case.⁷⁹ The fact that the disputing parties cannot decide who hears their case provides a strong contrast with investment arbitration, in its current form, as well as UNCLOS arbitration and the potential for the use of chambers in ITLOS and the ICJ.⁸⁰ While decisions of the AB are taken by the ‘division’ of three members which hears an appeal, the other members of the AB are involved in deliberations.⁸¹ Members of the AB are appointed by the DSB, composed of all WTO members, after an initial screening process where powerful WTO members have particular influence.⁸² The membership of the AB is to be ‘broadly representative’ of the WTO membership, and in practice this has led to major economies, such as the United States (US), the European Union (EU), and China, having a quasi-permanent seat on the AB.⁸³ Members are appointed for relatively short terms of four years, which can be renewed once.⁸⁴ The process for appointments is intensely political, with states engaging in extensive vetting of candidates to secure members which suit their interests.⁸⁵ In May 2016, in a highly controversial move, the US blocked the reappointment of a sitting AB member because of his involvement in reports which the US argued exceeded the role assigned to the AB, as well as his questioning during oral hearings.⁸⁶ This move was criticised by numerous WTO members⁸⁷ and

⁷⁵ Ibid 787.

⁷⁶ DSU, Art 8.4; See also Art 8.1 (regarding qualification requirements).

⁷⁷ Pauwelyn, ‘Rule of Law’ (n 70) 785.

⁷⁸ Shaffer, Elsig and Puig (n 67) 11–12; Ibid 772–774.

⁷⁹ DSU, Art 17.1; ‘Working Procedures for Appellate Review’ (2010) WT/AB/WP/6, r 6(2).

⁸⁰ The relevant appointment arrangements for these bodies are discussed below Chs IV(A)(3), V(A)(3).

⁸¹ AB Working Procedures (n 79) r 4(3).

⁸² Shaffer, Elsig and Puig (n 67) 6–7.

⁸³ Ibid (noting the AB has always included one US and one EU national, and since 2008 a Chinese national).

⁸⁴ DSU, Art 17.2.

⁸⁵ Manfred Elsig and Mark A Pollack, ‘Agents, Trustees, and International Courts: The Politics of Judicial Appointment at the World Trade Organization’ (2014) 20 EJIR 391, 393–4, 403–9.

⁸⁶ WTO DSB, Minutes of Meeting (23 May 2016) WT/DSB/M/379, 14–17.

⁸⁷ Ibid 17–30.

unanimously by all living former AB members,⁸⁸ given its negative implications for the AB's independence. Subsequently, WTO members have engaged in discussions regarding reform of the reappointment process, including the possibility of moving to single longer term, but no agreement has yet emerged.⁸⁹ Quite unusually, while individual opinions are permitted in WTO adjudication, the DSU mandates that they are anonymised.⁹⁰ Compared to other international tribunals, individual opinions are very rare,⁹¹ and the AB has consistently pursued a policy of speaking with one voice.⁹²

It is also important to note the unusually influential role played by the WTO's Secretariat.⁹³ The Secretariat is given a role under the DSU in assisting panels on legal and other relevant matters.⁹⁴ The crucial point is that the Secretariat is permanent, and has much more accumulated expertise and time than panel members, who typically have other full-time jobs.⁹⁵ The Secretariat, for example, prepares issues papers and drafts the initial opinion,⁹⁶ a practice which reportedly also occurs in the Appellate Body.⁹⁷

d) Remedies in WTO Law

A final contextual feature highly relevant to understanding WTO adjudication is the system of remedies which operates in this setting. In summary the process works as follows. Where WTO adjudicators conclude that a measure is inconsistent with a covered agreement, they must recommend that the losing member bring the measure 'into conformity'.⁹⁸ Adjudicators can 'suggest ways in which the Member concerned could

⁸⁸ Letter from Georges Abi-Saab et al to Chairman of WTO DSB (31 May 2016) <<http://worldtradelaw.typepad.com/files/abletter.pdf>>.

⁸⁹ 'U.S. Rejects Proposal to End Appellate Body Reappointment, Extend Term Lengths' *Inside US Trade's Daily Report* (27 October 2016).

⁹⁰ DSU, Arts 14.3 (panels), 17.11 (AB); See generally Jeffrey L Dunoff and Mark A Pollack, 'The Judicial Trilemma' (Manuscript of August 2016, on file) (comparing this practice to various international courts).

⁹¹ Dunoff and Pollack, *ibid* 50 (noting as of October 2012 less than 8% of panel reports, and 4.65% of AB reports contained individual opinions).

⁹² See AB Working Procedures (n 79) r 3(2) (AB and its divisions to 'make every effort to take their decisions by consensus'); Dunoff and Pollack, *ibid* 51-52 (citing the views of multiple original AB members).

⁹³ Shaffer, Elsig and Puig (n 67) 12-15; Weiler (n 1) 205-6.

⁹⁴ See DSU, Art 27.1.

⁹⁵ Shaffer, Elsig and Puig (n 67) 13.

⁹⁶ *Ibid*; Pauwelyn, 'Rule of Law' (n 70) 795.

⁹⁷ Claus-Dieter Ehlermann, 'Revisiting the Appellate Body: The First Six Years' in Marceau (ed), *A History of Law and Lawyers in the GATT/WTO* (n 72) 498; In the same volume, Debra P Steger, 'The Founding of the Appellate Body', 452-3.

⁹⁸ DSU, Art 19.1.

implement the recommendations⁹⁹ but this power is non-binding and used reluctantly,¹⁰⁰ which is an important signal of deference towards the sovereignty retained by members.¹⁰¹ As noted above, in the absence of an agreed solution the first objective of the DSS is to secure the withdrawal of measures found to be WTO inconsistent.¹⁰² Compensation is to be ‘resorted to only if the immediate withdrawal of the measure is impracticable and as a temporary measure’, and the final, least preferred option in the event of continuing non-compliance is the suspension of trade concessions which must be authorised by the DSB.¹⁰³

Once a panel or the AB’s rulings and recommendations are adopted by the DSB, a member has ‘a reasonable period of time’ in which to comply, a period which can either be mutually agreed by the parties or be subject to arbitration, and should usually not exceed 15 months.¹⁰⁴ After a reasonable period of time is set, the issue of the member’s implementation of the ruling is placed on the DSB’s agenda and the member concerned must provide reports on its implementation of the ruling.¹⁰⁵ Where there is disagreement regarding whether the losing member has complied with the original ruling, a victorious member can bring compliance proceedings before the original panel, which can be appealed.¹⁰⁶ If a member is found in such proceedings to have failed to bring a measure into compliance within a reasonable period of time, the victorious member may request that the losing member enter into negotiations to develop ‘mutually acceptable compensation’.¹⁰⁷ Such compensation is voluntary,¹⁰⁸ and only aims to compensate for future harm, until a DSB ruling is implemented.¹⁰⁹ If satisfactory compensation is not agreed, the victorious member can request authorisation from the DSB to suspend the application to the losing member ‘of concessions or other obligations under the covered agreements’,¹¹⁰ which are to be ‘equivalent to the level of nullification of impairment’

⁹⁹ Ibid.

¹⁰⁰ See Palmeter and Mavroidis (n 2) 295–300.

¹⁰¹ Shany (n 13) 207–8.

¹⁰² DSU, Art 3.7

¹⁰³ DSU, Arts 3.7, 22.1.

¹⁰⁴ DSU, Art 21.3.

¹⁰⁵ See DSU, Art 21.6.

¹⁰⁶ DSU, Art 21.5.

¹⁰⁷ DSU, Art 22.2.

¹⁰⁸ DSU, Art 22.1.

¹⁰⁹ Chester Brown, *A Common Law of International Adjudication* (OUP 2007) 219.

¹¹⁰ DSU, Art 22.2.

suffered by the complaining party.¹¹¹ If the losing member objects to the level of retaliation proposed, an arbitrator can be appointed to determine the appropriate level of suspension of concessions, and this decision is final.¹¹²

Plainly, under the above system, the parties retain a high degree of control over how their dispute is resolved once a finding of non-compliance is made.¹¹³ The system is also strikingly prospectively focused,¹¹⁴ in that it is aimed primarily at bringing a non-compliant measure into conformity, and arguably also at restoring the balance of trade concessions where a non-compliant measure is maintained.¹¹⁵ In practice, diplomatic bargaining in the shadow of relevant judicial decisions frequently occurs at multiple points in the above process once a measure is found non-compliant. Disputes are resolved through diplomatic negotiations, informed by the decisions of WTO adjudicators, and judicial decision-making ‘simply serves to help the parties resolve their dispute’.¹¹⁶ Furthermore, where domestic measures have been found WTO-inconsistent, including in high profile trade linkage disputes, adjudicators have often focused their ruling on how the measure is administered, rather than the entire underlying policy or law, which gives members a relatively straightforward option for bringing the measure into compliance, for example through administrative changes at the level of the domestic executive.¹¹⁷

Equipped with this understanding of the context in which WTO adjudication occurs, we are well placed to begin our comparative reading of the three selected problems facing contemporary adjudicators.

¹¹¹ DSU, Art 22.4.

¹¹² DSU, Arts 22.6, 22.7.

¹¹³ Brooks E Allen, ‘The Use of Non-Pecuniary Remedies in WTO Dispute Settlement: Lessons for Arbitral Practitioners’ in Michael E Schneider and Joachim Knoll (eds), *Performance as a Remedy: Non-Monetary Relief in International Arbitration* (Juris 2011) 289–90, 297.

¹¹⁴ Brown (n 109) 220.

¹¹⁵ See text above n 30ff.

¹¹⁶ Gregory Shaffer, ‘Developing Country Use of the WTO Dispute Settlement System: Why it Matters, the Barriers Posed’ in James C Hartigan (ed), *Trade Disputes and the Dispute Settlement Understanding of the WTO: An Interdisciplinary Assessment* (Emerald Group Publishing 2009) 174; Pauwelyn, ‘Rule of Law’ (n 70) 802; Shlomo-Agon (n 15) 691–695 (analysing the contribution of the DSS in protracted disputes and emphasising its role of facilitating settlements, by constructing reference points around which the parties can negotiate).

¹¹⁷ Shaffer, Elsig and Puig (n 67) 23; Robert Howse, ‘The World Trade Organization 20 Years On: Global Governance by Judiciary’ (2016) 27 EJIL 9, 52; Shlomo-Agon (n 15) 688.

B. Balancing Stability and Change in the Environmental Case Law of the WTO

The section analyses how WTO adjudicators have managed potential changes in international legal norms or changes in relevant facts in environmental disputes. Specifically, I am interested in how WTO adjudicators have balanced the competing interests of stability and legal certainty on the one hand, and responsiveness to new developments on the other. Others have argued that the ability of WTO adjudicators to adapt the law incrementally, in the absence of new treaty law, treaty amendment or authoritative interpretation, has been a key reason for the system's success,¹¹⁸ and it is accordingly an excellent example for analysing this aspect of contemporary adjudication.¹¹⁹

1. Managing Changes in International Legal Norms

One of the most striking instances of WTO adjudicators managing potential change in relevant legal norms is the AB's report in *US-Shrimp*.¹²⁰ The relevant part of the case concerned whether the challenged US measure, aimed at the conservation of sea turtles, provisionally fell within the exception in GATT Article XX(g) which covers 'measures relating to the conservation of exhaustible natural resources'.¹²¹ The AB rejected the argument, made by the complaining members, that the term 'exhaustible natural resources' only covered nonliving natural resources and could not, in light of its drafting

¹¹⁸ Robert Howse, 'Moving the WTO Forward-One Case at a Time' (2009) 42 Cornell ILJ 223, 230–1; Alan Yanovich, 'The Evolving WTO Dispute Settlement System' in Yasuhei Taniguchi, Alan Yanovich and Jan Bohanes (eds), *The WTO in the Twenty-First Century: Dispute Settlement, Negotiations, and Regionalism in Asia* (CUP 2007) 248, 257.

¹¹⁹ Another area where WTO practices potentially offer wider lessons concerns how adjudicators should manage potential changes through soft-law norms, often promulgated by hybrid public-private standardisation bodies. Both the TBT and SPS Agreements contain a conditional obligation for members to base their measures on certain types of international standards, and measures which accord with such standards are presumed to comply with the Agreements: SPS Agreement, Arts 3.1-3.2, TBT Agreement, Arts 2.4-2.5; This raises sharp legitimacy concerns because not all WTO members participate in the relevant standard-setting bodies, which permit majority voting and may be captured by powerful economic interests: Robert Howse, 'A New Device for Creating International Legal Normativity: The WTO Technical Barriers to Trade Agreement and "International Standards"' in Ernst-Ulrich Petersmann and Christian Joerges (eds), *Constitutionalism, Multilevel Trade Governance and Social Regulation* (Hart 2006) 390–392; The AB, relying on a decision of the TBT Committee, has enunciated certain conditions that must be met for a standard to be given interpretive weight, which are aimed at ensuring that standard development is representative and transparent: see *United States—Measures Concerning the Importation, Marketing and Sale of Tuna and Tuna Products—Report of the Appellate Body* (16 May 2012) WT/DS381/AB/R, [364]–[394]; Regarding how adjudicators might scrutinise the quality of the process through which informal norms are developed see especially Joanne Scott, 'International Trade and Environmental Governance: Relating Rules (and Standards) in the EU and the WTO' (2004) 15 EJIL 307, 310–12, 344–354; Joost Pauwelyn, Rams A Wessel and Jan Wouters, 'When Structures Become Shackles: Stagnation and Dynamics in International Lawmaking' (2014) 25 EJIL 733, 757–762.

¹²⁰ *US-Shrimp* (n 12).

¹²¹ GATT, Art XX(g).

history, cover living resources.¹²² The AB's interpretation demonstrates a subtle navigation of the competing interests of stability and legal certainty, on the one hand, and allowing legal categories to evolve, on the other. It began by noting that the words in question, although drafted over 50 years ago, 'must be read ... in the light of contemporary concerns of the community of nations about the protection and conservation of the environment.'¹²³ In order to support this position, which on its face threatens stability, the AB moved immediately to show its basis in existing law, and in members' consent. First, it noted that the 'preamble attached to the *WTO Agreement* shows that the signatories to that Agreement were, in 1994, fully aware of the importance and legitimacy of environmental protection as a goal of national and international policy', highlighting the explicit reference to 'the objective of sustainable development'.¹²⁴ Second, the AB reasoned that the term 'natural resources' was 'generic' and 'by definition, evolutionary',¹²⁵ and it was accordingly 'pertinent to note that modern international conventions and declarations make frequent references to natural resources as embracing both living and non-living resources', referring variously to UNCLOS, the 1992 Convention on Biological Diversity (CBD), and other soft law instruments.¹²⁶ Given this practice and the language of the 1994 Preamble, it was 'too late in the day' to interpret Article XX(g) as only referring to exhaustible mineral or nonliving resources, as the appellees suggested.¹²⁷ In short, on the AB's account WTO members had agreed to a generic term, whose meaning could evolve over time in light of the contemporary international law on conservation. A crucial part of the context for this interpretation was that the WTO was at the time facing intense legitimacy concerns regarding its responsiveness to non-trade and particularly environmental concerns.¹²⁸ As we will see further below, WTO adjudicators have generally been very careful to demonstrate sensitivity to non-trade interests, reflecting the role of adjudication in legitimating the wider Organization.

¹²² See *US-Shrimp* (n 12) [127].

¹²³ *Ibid* [129].

¹²⁴ *Ibid* [129].

¹²⁵ *Ibid* [130]; For another example, outside the environmental context, of WTO adjudicators concluding that a treaty term had a generic meaning see *China-Measures Affecting Trading Rights and Distribution Services for Certain Publications and Audiovisual Entertainment Products-Report of the Appellate Body* (21 December 2009) WT/DS363/AB/R, [395]-[397].

¹²⁶ *US-Shrimp* (n 12) [130] and accompanying footnotes; Convention on Biological Diversity (1992) 1760 UNTS 79.

¹²⁷ *Ibid* [131].

¹²⁸ Howse, '20 Years On' (n 117) 38-39.

The question of potential change in legal norms also arose in one part of the *EC-Biotech* case, which concerned the legality of the European Communities (EC)'s measures affecting the approval of biotechnology products. In short the EC sought to have the Panel interpret the applicable WTO provisions in light of two external treaties, the CBD and its Protocol on Biosafety (Biosafety Protocol),¹²⁹ and the precautionary principle, as a general principle of law.¹³⁰ The Panel's approach strongly favoured the interest of treaty stability and legal certainty, suggesting that any other rule invoked needed to be applicable between all parties to the treaty under interpretation, that is, all WTO Members.¹³¹ As the CBD and Biosafety Protocol were not applicable between all WTO members, neither of them were applicable under Article 31(3)(c) of the Vienna Convention on the Law of Treaties (VCLT).¹³² The effect of this interpretation is to give a veto power to WTO members who have not consented to the non-WTO rules concerned over the evolution of WTO law in light of such other rules.¹³³ The Panel's approach ensures a high degree of stability: WTO members will not be taken by surprise by interpretations of WTO law in light of other norms that they have not consented to, but WTO law, and similarly any other multilateral treaty with a large number of parties, is rendered static and isolated, unable to reflect other important developments in international law.

A somewhat more nuanced balance between the competing interests of stability and legal certainty, and change and responsiveness to broader legal developments, was struck by the AB in the *EC-Hormones* dispute, a case concerning SPS measures applied by the EC to hormone-treated beef, where the EC argued that Articles 5.1 and 5.2 of the SPS Agreement should be interpreted in accordance with a precautionary approach.¹³⁴ The AB began by finding that it was 'less than clear' whether the principle had 'been widely accepted by Members as a principle of *general or customary international law*' and that 'at least outside the field of international environment law, [it] still awaits authoritative

¹²⁹ *European Communities–Measures Affecting the Approval and Marketing of Biotech Products–Reports of the Panel* (29 September 2006) WT/DS291/R, WT/DS292/R, WT/DS293/R, [7.53]-[7.55]; Cartagena Protocol on Biosafety to the CBD (2000) 2226 UNTS 208.

¹³⁰ *Ibid* [7.77]-[7.79].

¹³¹ See *ibid* [7.68], [7.71]-[7.72].

¹³² *Ibid* [7.74]-[7.75]; VCLT (1969) 1155 UNTS 331, Art 31(3)(c).

¹³³ Margaret A Young, 'Regime Interaction in Creating, Implementing and Enforcing International Law' in Margaret A Young (ed), *Regime Interaction in International Law: Facing Fragmentation* (CUP 2012) 95–6.

¹³⁴ *EC–Hormones* (n 4) [121].

formulation'.¹³⁵ This move was plainly motivated by the AB's desire not 'to take a position' on this controversial issue of legal development.¹³⁶ Yet despite not taking such a position, the AB held that the principle 'finds reflection in Article 5.7 of the SPS Agreement'.¹³⁷ Further, the AB was able to find space for precautionary reasoning in its instruction that a panel, charged with reviewing Member's SPS measures, 'should, bear in mind that responsible, representative governments commonly act from perspectives of prudence and precaution where risks of irreversible, e.g. life-terminating, damage to human health are concerned'.¹³⁸ These statements are significant because prior to this interpretation, the precautionary principle was not explicitly mentioned in the relevant treaty provisions, whereas after the AB's interpretation, such a reading is an accepted part of the GATT/WTO *acquis*.¹³⁹ Moreover, so as not to threaten legal certainty, the AB presented its interpretive findings, as in *US-Shrimp*, as present within the treaty provisions the parties had consented to. Conscious not to move too far away from those provisions, the AB noted that the precautionary principle did not justify 'SPS measures that are otherwise inconsistent with the obligations of Members set out in particular provisions of that Agreement' nor 'relieve a panel from the duty of applying the normal (ie. customary international law) principles of treaty interpretation'.¹⁴⁰ These comments are aimed at addressing members' interest in certainty regarding the content of the obligations established by the SPS Agreement.

The recent Panel report in *India-Solar Cells* deserves brief mention here because of the question it raised of potential change in one of the relevant international legal norms. India sought to justify its domestic content measures concerning solar cells, which were held to violate relevant WTO norms, under the exception in GATT Article XX(j) concerning measures which are 'essential to the acquisition or distribution of products in general or local short supply'. The Panel accepted India's argument that the terms 'products in general or local short supply' were generic terms, and were not limited to situations of short supply arising from war or natural disasters – as had been foreseen

¹³⁵ Ibid [123].

¹³⁶ Ibid [123]. Similarly: *EC-Biotech* (n 129) [7.88]-[7.89].

¹³⁷ *EC-Hormones* (n 4) [124].

¹³⁸ Ibid [124].

¹³⁹ See eg *United States-Continued Suspension of Obligations in the EC-Hormones Dispute-Report of the Appellate Body* (16 October 2008) WT/DS320/AB/R, [680].

¹⁴⁰ *EC-Hormones* (n 4) [124].

when the provision was drafted – but could cover shortages arising from other causes.¹⁴¹ The Panel also accepted that ‘the types of measures that are “essential” to address situations of general or local short supply may need to be seen in the context of contemporary concerns of a country and the international community’.¹⁴² These parts of the Panel’s interpretation suggest that the meaning of Article XX(j) might evolve, for example given new concerns of the international community. However, the Panel ultimately favoured the interest of legal certainty by holding that the ‘applicable legal standard’ for the application of Article XX(j) had not changed over time. Furthermore, even if, as a consequence of globalization and trade liberalization the factual circumstances for invoking the provision no longer existed – a suggestion the Panel did not accept – ‘it would not be open to a treaty interpreter to change the applicable legal standard’.¹⁴³ Subsequently, the AB has interpreted the content of Article XX(j) in highly generic terms, explaining that the provision’s application depends upon various factual considerations which are clearly prone to change. These include the different development levels of members, which were recognised as potentially relevant to whether products are in short supply in a particular market.¹⁴⁴ The effect of the AB’s interpretation is to give the provision a meaning that can address a range of contemporary and future concerns.

2. *Managing Changes in Relevant Facts*

WTO adjudicators have repeatedly faced the problem that facts which affect the application of relevant treaty provisions may change. For example, in *United States–Continued Suspension*,¹⁴⁵ the AB considered whether the EC’s provisional SPS measures were permitted under Article 5.7 of the SPS Agreement, which allows the adoption of such measures where relevant scientific evidence is ‘insufficient’ to conduct a full risk assessment.¹⁴⁶ In contrast, where sufficient scientific evidence does exist, members’ SPS measures must be based on a risk assessment, appropriate to the circumstances.¹⁴⁷ The AB’s approach accepted the relevance of factual change in applying these provisions by

¹⁴¹ *India–Certain Measures Relating to Solar Cells and Solar Modules–Report of the Panel* (24 February 2016) WT/DS456/R, [7.232], [7.208]–[7.215].

¹⁴² *Ibid* [7.232].

¹⁴³ *Ibid* [7.233], [7.229].

¹⁴⁴ See *ibid*, Report of the Appellate Body (16 September 2016), [5.71]–[5.72].

¹⁴⁵ *US–Continued Suspension* (n 139).

¹⁴⁶ SPS Agreement, Art 5.7.

¹⁴⁷ *Ibid* Art 5.1. See also Arts 2.2, 5.2.

holding that ‘scientific progress may lead a WTO Member and international organizations to reconsider the risk assessment underlying an SPS measure’ and either conduct a new risk assessment, or, where the ‘scientific developments themselves do not permit the performance of a new risk assessment that is sufficiently objective’, adopt provisional SPS measures.¹⁴⁸ Noting that ‘science continuously evolves’, the AB held that scientific advances ‘at the margins ... would not support the conclusion that previously sufficient evidence has become insufficient’, however ‘[l]imiting the application of Article 5.7 to situations where scientific advances lead to a paradigm shift would be too inflexible an approach.’¹⁴⁹ Accordingly, the AB held that provisional SPS measures are permitted ‘where new evidence from a qualified and respected source puts into question the relationship between the pre-existing body of scientific evidence and the conclusions regarding the risks’.¹⁵⁰

The problem of managing changes in relevant facts also arose in the recent case of *India-Agricultural Products* which concerned the legality of a ban by India on the import of various agricultural products given concerns about avian influenza.¹⁵¹ Here the AB was interpreting the obligation to ensure SPS measures ‘are adapted’ to the SPS characteristics of the area from which a product originates under Article 6.1 of the SPS Agreement.¹⁵² The AB held that this obligation ‘is not static, but rather ongoing, requiring that SPS measures be adjusted over time so as to establish and maintain their continued suitability in respect of the relevant SPS characteristics of the relevant areas’.¹⁵³ For example, adaption of an SPS measure would be required if, after its adoption, ‘an exporting Member objectively demonstrates the existence of a pest- or disease-free area’.¹⁵⁴ The AB further noted that ‘compliance with the obligations in Articles 6.1 and 6.2 will be facilitated in circumstances where WTO Members put in place a regulatory scheme or structure that accommodates adaptation of SPS measures on an ongoing basis’.¹⁵⁵ In short,

¹⁴⁸ *US–Continued Suspension* (n 139) [701].

¹⁴⁹ *Ibid* [703]. Similarly [705].

¹⁵⁰ *Ibid* [703].

¹⁵¹ *India–Measures Concerning the Importation of Certain Agricultural Products–Report of the Appellate Body* (4 June 2015) WT/DS430/A/R, [1.2]–[1.3], [4.1]–[4.13].

¹⁵² SPS Agreement, Art 6.1.

¹⁵³ *India–Agricultural Products* (n 151) [5.132]. See also [5.154].

¹⁵⁴ *Ibid* [5.154].

¹⁵⁵ *Ibid* [5.138].

in both of these cases WTO adjudicators recognised that factual changes would affect what the relevant provisions required of members at a particular point in time.

C. The Standard and Method of Review in WTO Environmental Adjudication

1. Standard of Review in the WTO: The Approach Developed in SPS Disputes

a) Background: The SPS Agreement and the Role of Science

The issue of the standard of review will be analysed by considering how this problem has been managed in disputes under the SPS Agreement, reflecting that in this context adjudicators have repeatedly been faced with contested, factually complex science-based claims.¹⁵⁶ The SPS Agreement gives a prominent role to scientific knowledge. While SPS measures which conform to international standards benefit from a presumption of compliance with the SPS and GATT Agreements,¹⁵⁷ measures which do not conform to international standards, either because none exist or a higher level of protection has been selected by a regulating state, must satisfy several requirements.¹⁵⁸ SPS measures must be ‘applied only to the extent necessary to protect human, animal or plant life’, be ‘based on scientific principles’, and ‘not maintained without sufficient scientific evidence’.¹⁵⁹ They must also be ‘based on’ a risk assessment, as appropriate to the circumstances,¹⁶⁰ and in the assessment of risks members are to take account of ‘available scientific evidence’.¹⁶¹ Provisional SPS measures, as we have seen, are only permitted ‘where relevant scientific evidence is insufficient’.¹⁶² Adjudicating disputes under the above provisions raises sharp legitimacy concerns because the WTO judiciary could potentially be ‘turned into a science court’ which would pronounce on the permissibility of regulations which pursue vital domestic policies, such as protecting human health and life.¹⁶³

b) The Approach Developed in SPS Case Law

The leading case regarding the standard of review under the SPS Agreement is *US-Continued Suspension*, which was a continuation of the *EC-Hormones* dispute, and

¹⁵⁶ See above n 5-6.

¹⁵⁷ SPS Agreement, Art 3.2.

¹⁵⁸ Ibid Art 3.3.

¹⁵⁹ Ibid Art 2.2.

¹⁶⁰ Ibid Art 5.1.

¹⁶¹ Ibid Art 5.2. See also Art 5.3.

¹⁶² Ibid Art 5.7.

¹⁶³ Howse, ‘20 Years On’ (n 117) 57, 59–60; Vern R Walker, ‘Keeping the WTO from Becoming the World Trans-Science Organization: Scientific Uncertainty, Science Policy, and Factfinding in the Growth Hormones Dispute’ (1998) 31 Cornell ILJ 251, 254–5.

involved extended argument over the risk assessment supporting the EC's SPS measures on hormone-treated beef.¹⁶⁴ In *US-Continued Suspension* the AB stressed that when reviewing the consistency of an SPS measure with the requirement that the measure is 'based on a risk assessment' a panel is not to substitute 'its own scientific judgement for that of the risk assessor' and conduct a *de novo* review. According to the AB 'the review power of a panel is not to determine whether the risk assessment undertaken by a WTO Member is correct, but rather to determine whether that risk assessment is supported by coherent reasoning and respectable scientific evidence and is, in this sense, objectively justifiable'.¹⁶⁵ The relevant background here is that in *EC-Hormones* the EC had argued that a "deferential 'reasonableness standard' is applicable in "all highly complex factual situations".¹⁶⁶ The AB, after recalling that the standard of review under the SPS agreement 'must reflect the balance established ... between the jurisdictional competences conceded by the Members to the WTO and the jurisdictional competences retained by the Members', found that under Article 11 of the DSU the applicable standard of review is 'neither *de novo* review, as such, nor "total deference", but rather the "objective assessment of the facts"'.¹⁶⁷

More concretely, in *US-Continued Suspension* the AB instructed panels to 'first, identify the scientific basis upon which the SPS measure was adopted'. The 'scientific basis need not reflect the majority view within the scientific community but may reflect divergent or minority views'.¹⁶⁸ Second, the panel must verify 'the scientific basis comes from a respected and qualified source', which requires that 'the views must be considered to be legitimate science according to the standards of the relevant scientific community'.¹⁶⁹ Third, a panel must 'assess whether the reasoning articulated on the basis of the relevant scientific evidence is objective and coherent', which involves reviewing 'whether the particular conclusions drawn by the Member assessing the risk find sufficient support in the scientific evidence relied upon'.¹⁷⁰ 'Finally, the panel must determine whether the

¹⁶⁴ The EC, having lost the earlier *EC-Hormones* dispute, argued that it had brought its measures into compliance and thus the US and Canada had to cease the suspension of concessions. The EC had carried out further scientific studies and performed new risk assessments after losing the initial case: *US-Continued Suspension* (n 139) [1], [488]-[496].

¹⁶⁵ *Ibid* [590].

¹⁶⁶ *EC-Hormones* (n 4) [113].

¹⁶⁷ *Ibid* [115]-[117].

¹⁶⁸ *US-Continued Suspension* (n 139) [591].

¹⁶⁹ *Ibid* [591].

¹⁷⁰ *Ibid* [591].

results of the risk assessment “sufficiently warrant” the SPS measure at issue.¹⁷¹ The Panel in *US-Continued Suspension* was essentially faulted for having surveyed the scientific experts consulted in order to decide ‘what it considered to be the best science rather than following the more limited exercise’ just outlined.¹⁷² While the Panel could utilise expert assistance to answer the four-step approach outlined above, the Panel should not have tested ‘whether the experts would have done a risk assessment in the same way and would have reached the same conclusions as the risk assessor’.¹⁷³ This reflects that the Panel was charged with reviewing the member’s risk assessment rather than performing a risk assessment itself.¹⁷⁴

On the above approach, panels are not to engage in de novo review of the scientific evidence on which a risk assessment is based.¹⁷⁵ However, in *Australia-Apples*, where Australia’s risk assessment was found to have an insufficiently close relationship to the underlying scientific evidence, the AB distinguished between ‘scrutinizing the underlying scientific evidence ... [and] scrutinizing the reasoning of the risk assessor’. Specifically, the AB stated that while ‘a panel is not well suited to conduct scientific research and assessments itself, and should not substitute its judgement for that of a risk assessor’, it ‘must be able to review whether the conclusions of the risk assessor are based on the scientific evidence relied upon, and are, accordingly, objective and coherent’.¹⁷⁶ This is an important aspect of the approach developed in the SPS case law. On the one hand, it reflects the tendency, which we will see is present in the other contexts studied, for adjudicators to avoid de novo review of assessments based on scientific or other specialised expertise once they are satisfied that the evidence comes from a reputable source. On the other hand, the fact that WTO adjudicators must review the reasoning of a risk assessor, to decide ‘whether or not the requisite rational or objective relationship exists’ between the scientific evidence and the conclusions drawn by the risk assessor,¹⁷⁷ shows that significant space is retained for international scrutiny over national-level SPS

¹⁷¹ Ibid [591], see also [528].

¹⁷² Ibid [612], [598].

¹⁷³ Ibid [592].

¹⁷⁴ Ibid [590], [592].

¹⁷⁵ *EC-Hormones* (n 4) [117].

¹⁷⁶ *Australia-Measures Affecting the Importation of Apples from New Zealand-Report of the Appellate Body* (29 November 2010) WT/DS367/AB/R, [224]-[225]. See also [226] (holding that the AB must be able to review the reasoning and intermediate conclusions that lead up to the ultimate conclusions of a risk assessor).

¹⁷⁷ Ibid [225].

measures.¹⁷⁸ Through this approach, WTO adjudicators are, with the assistance of expert evidence, evaluating what counts as coherent reasoning within a risk assessment,¹⁷⁹ such that it will meet the standard of having a ‘rational or objective’ relationship with the underlying scientific evidence,¹⁸⁰ even if this is tempered by the fact that the question is not whether the experts would have done a risk assessment in the same way as the regulating state, or reached the same conclusions.¹⁸¹

There are two potential pitfalls which arise here, and are highly relevant to the wider problem of the standard of review, particularly in fact-intensive environmental disputes. First, scrutinising the reasoning deployed in a risk assessment process involves many of the same difficulties that arise in scrutinising the underlying scientific evidence, reflecting that both are questions relying on specialised expertise which adjudicators do not hold,¹⁸² and accordingly there are difficulties in fully understanding and evaluating the (often conflicting) evidence of experts.¹⁸³ Second, if adjudicators decide upon the respective merits of rival risk assessment methodologies, this can bring them very close to engaging in *de novo* review of the relevant risk assessment, which is, under the case law, said to be impermissible.¹⁸⁴ On the other hand, the question of whether the reasoning of a risk assessor has a sufficient relationship with the underlying scientific evidence might be answered in a deferential way.¹⁸⁵ In this regard, some aspects of the approach developed by the AB reduce the scope for second-guessing the reasoning of a national-level risk assessor. As we have seen, the AB has instructed panels to ‘bear in mind that responsible representative governments commonly act from perspective of prudence and precaution where risks of irreversible eg. life-terminating, damage to human health are concerned’, a statement which ‘implies that an additional margin of discretion’ is owed to members.¹⁸⁶

¹⁷⁸ Foster argues that such scrutiny is appropriate because otherwise international legal obligations would be undermined, and in the context of the SPS agreement, disguised protection could go unaddressed: Caroline E Foster, ‘International Adjudication—Standard of Review and Burden of Proof: Australia-Apples and Whaling in the Antarctic’ (2012) 21 *RECIEL* 80, 83. In her view, WTO panels have proven able to assess complex cases involving technical evidence: 85.

¹⁷⁹ *US—Continued Suspension* (n 139) [590], [592].

¹⁸⁰ *Australia—Apples (AB)* (n 176) [225].

¹⁸¹ *US—Continued Suspension* (n 139) [592].

¹⁸² Gruszczynski (n 5) 755–6.

¹⁸³ *Ibid* 743–6.

¹⁸⁴ *Ibid* 756; Andrew Lang, *World Trade Law after Neoliberalism: Reimagining the Global Economic Order* (OUP 2011) 341; Catherine Button, *The Power to Protect: Trade, Health and Uncertainty in the WTO* (Hart 2004) 190.

¹⁸⁵ Gruszczynski (n 5) 756.

¹⁸⁶ *Ibid* 741.

Furthermore, the relevant question is not merely risk ‘ascertainable in a science laboratory operating under strictly controlled conditions, but also risk in human societies as they actually exist’,¹⁸⁷ meaning the risks of abuse can be factored into a risk assessment.¹⁸⁸ The AB has also accepted that the risk which is being assessed does not have to be quantifiable,¹⁸⁹ and ‘[w]here multiple factors may contribute to a particular risk, a risk assessor is not required to differentiate the individual contribution made by each factor.’¹⁹⁰

Notwithstanding these moves to soften the intensity of international review of national-level risk assessments, the above analysis shows that at a minimum, the approach developed in SPS case law requires adjudicators, with expert assistance, to make important normative judgements as to what amounts to an adequate risk assessment process in the particular circumstances.¹⁹¹ The approach established in SPS case law is, in other words, ‘hardly innocent of substantive implications’,¹⁹² even if it rightly seeks to avoid adjudicators themselves deciding on questions of scientific correctness, or themselves performing a risk assessment. In sum, the real significance, in comparative perspective, of the debate concerning the standard of review in this setting is to remind us that while there are good reasons for adjudicators to avoid full substitutionary de novo review of domestic-level determinations based on scientific or other specialised expertise, any meaningful form of international scrutiny still requires adjudicators to take a stance on what counts as an adequate domestic decision-making process.

2. *Methods of Review Utilised in WTO Environmental Cases: Necessity Testing as Practiced in the GATT, TBT, and SPS Contexts*

Under the GATT, TBT, and SPS Agreements least restrictive means testing has emerged as a dominant method of review for scrutinising measures which pursue a legitimate non-trade aim but also restrict protected trade interests. As explained in Chapter One, concerns have been raised regarding whether it is appropriate for international adjudicators to engage in full proportionality review given it involves a controversial final step where the relative importance of the competing rights and interests is weighed in an open-ended

¹⁸⁷ *EC–Hormones* (n 4) [187].

¹⁸⁸ *US–Continued Suspension* (n 139) [545]; *EC–Hormones* (n 4) [206].

¹⁸⁹ See *US–Continued Suspension* (n 139) [569]; *EC–Hormones* (n 4) [186]–[187].

¹⁹⁰ *US–Continued Suspension* (n 139) [562].

¹⁹¹ Jacqueline Peel, *Science and Risk Regulation in International Law* (CUP 2010) 354–5.

¹⁹² Lang (n 184) 346.

manner.¹⁹³ As we will see, the methods of review developed by WTO adjudicators have avoided any second-guessing of the importance of the protected non-trade aim, or level of protection, pursued by a regulating member.

a) Necessity Testing under GATT Article XX(a), (b), (d)

Article XX of the GATT sets out a series of exceptions to the substantive obligations established in the Agreement given the importance of the domestic policy interests concerned.¹⁹⁴ In environmental cases to date members have sought to rely on exceptions under Article XX covering measures (a) ‘necessary to protect public morals’, (b) ‘necessary to protect human, animal or plant life or health’, (d) ‘necessary to ensure compliance with laws or regulations which are not inconsistent with the provisions of’ the GATT, and (g) ‘relating to the conservation of exhaustible natural resources’.¹⁹⁵ In order for a measure to be justified under Article XX it must first be shown to fall within one of the exceptions, and, second, must fulfil the requirements of the ‘chapeau’ of Article XX.¹⁹⁶ At the first stage, the degree of connection required between the measure and the policy goal differs depending on the wording of the relevant Article XX exception.¹⁹⁷ My focus is on the techniques which adjudicators have developed to determine whether a measure is ‘necessary’, under Article XX(a), (b), and (d).¹⁹⁸ Although GATT Article XX(g) has also been invoked in many environmental cases, the interpretation of the nexus it requires, that the measure be one ‘relating to the conservation of exhaustible natural resources’, has been less controversial.¹⁹⁹

¹⁹³ See above ch 1, text at n 118.

¹⁹⁴ *US–Shrimp* (n 12) [121].

¹⁹⁵ GATT, Art XX.

¹⁹⁶ *US–Gasoline* (n 11) 22.

¹⁹⁷ *Ibid* 18.

¹⁹⁸ WTO adjudicators have interpreted this term in the same way under Article XX(a), (b), and (d). For argument that this is a mistake see Gisele Kapterian, ‘A Critique of the WTO Jurisprudence on “Necessity”’ (2010) 59 ICLQ 89, 119.

¹⁹⁹ The term ‘relating to’ the conservation of exhaustible natural resources has been interpreted to require ‘a close and genuine relationship of means and ends’: *US–Shrimp* (n 12) [136]; *China–Measures Related to the Exportation of Various Raw Materials–Reports of the Appellate Body* (30 January 2012) WT/DS394/AB/R, WT/DS395/AB/R, WT/DS398/AB/R, [355]; *China–Measures Related to the Exportation of Rare Earths, Tungsten, and Molybdenum–Reports of the Appellate Body* (7 August 2014) WT/DS431-33/AB/R, [5.90], [5.95]–[5.96], [5.111]–[5.117]; The practical effect is that the nexus required under Article XX(g) is less onerous than the requirement of necessity under Articles XX(a), (b) and (d): Pirker (n 4) 310–311; Article XX(g) also requires that measures ‘are made effective in conjunction with restrictions on domestic production or consumption’; Regarding how this requirement applies to trade-restrictive conservation measures see especially *US–Gasoline* (n 11) 20–21; *China–Rare Earths*, [5.130]–[5.136]; *China–Raw Materials*, [356]–[360].

A succinct statement of necessity testing as developed in this context is offered by *Brazil-Retreaded Tyres*, a case where Brazil sought to justify measures concerning the importation of used tyres on public health and environmental grounds under GATT Article XX(b). According to the AB:

In order to determine whether a measure is “necessary” within the meaning of Article XX(b) ... a panel must assess all the relevant factors, particularly the extent of the contribution to the achievement of a measure’s objective and its trade restrictiveness, in the light of the importance of the interests or values at stake. If this analysis yields a preliminary conclusion that the measure is necessary, this result must be confirmed by comparing the measure with its possible alternatives, which may be less trade restrictive while providing an equivalent contribution to the achievement of the objective pursued.²⁰⁰

The AB stressed that it is for the complaining member to identify possible alternative less trade restrictive measures that the responding member could have taken, and a measure will only qualify as a ‘genuine alternative’ if it would achieve the responding members’ “desired level of protection with respect to the objective pursued”, and is “reasonably available”, taking into account potential costs and technical difficulties.²⁰¹ The ‘weighing and balancing’ process just outlined, is, according to the AB, ‘a holistic operation that involves putting all the variables of the equation together and evaluating them in relation to each other after having examined them individually, in order to reach an overall judgement’.²⁰²

Importantly WTO adjudicators have not in this context explicitly endorsed the final, controversial, stage of proportionality analysis, which involves weighing the costs of the measure against the importance of the policy objective pursued, and potentially setting aside a measure that is the least restrictive way to secure the policy goal selected by a regulating state.²⁰³ Although the references to ‘weighing and balancing’ may, at first

²⁰⁰ *Brazil–Measures Affecting Imports of Retreaded Tyres–Report of the Appellate Body* (3 December 2007) WT/DS332/AB/R, [156], similarly [178].

²⁰¹ *Ibid* [156], citing *United States–Measures Affecting the Cross-Border Supply of Gambling and Betting Services–Report of the Appellate Body* (7 April 2005) WT/DS285/AB/R, [308]-[311]; See also *European Communities–Measures Prohibiting the Importation and Marketing of Seal Products–Reports of the Appellate Body* (22 May 2014) WT/DS400/AB/R, WT/DS401/AB/R, [5.277].

²⁰² *Brazil–Tyres* (n 200) [182]; *EC–Seals* (n 201) [5.215].

²⁰³ My terminology draws on Caroline Henckels, *Proportionality and Deference in Investor-State Arbitration: Balancing Investment Protection and Regulatory Autonomy* (CUP 2015) 168.

glance, resemble full proportionality review, the ‘weighing and balancing’ is occurring as part of a multifaceted inquiry to determine if the measure is ‘necessary’ to achieve the state’s aim, or if a less restrictive alternative exists.²⁰⁴ Indeed, to the extent that the values pursued by a measure have been considered, this factor has been emphasised to ensure that measures pursuing important objectives, such as the protection of human health or life, are more easily found to be necessary.²⁰⁵ For example, in both *EC-Asbestos*, which concerned a ban on the import of products containing asbestos, and in *Brazil-Retreaded Tyres*, mentioned above, the AB, in undertaking the ‘weighing and balancing exercise’ emphasised the importance of the value of protecting human life and health.²⁰⁶ In both of these cases, the measures concerned were held to be necessary given the absence of reasonably available alternatives.²⁰⁷ This offers some reassurance that WTO adjudicators are not prioritising the value of free trade above other important non-trade values.²⁰⁸ WTO adjudicators are not well placed to engage in an evaluation of the relative importance of different regulatory aims, as would be involved in full proportionality review, given they are international-level actors detached from democratically accountable domestic institutions.²⁰⁹ Relatedly, WTO dispute settlement is not designed to impose a comprehensive normative vision on states, but to leave them free to pursue diverse regulatory goals.²¹⁰

²⁰⁴ Peter Van den Bossche, ‘Looking for Proportionality in WTO Law’ (2008) 35 LIEI 283, 289–91; Donald H Regan, ‘The Meaning of “necessary” in GATT Article XX and GATS Article XIV: The Myth of Cost–benefit Balancing’ (2007) 6 WTR 347, 348–352, 357–8; One example, from outside the environmental context, which is sometimes read as an example of full proportionality review is *Korea–Measures Affecting Imports of Fresh, Chilled and Frozen Beef–Report of the Appellate Body* (11 December 2000) WT/DS161/AB/R, WT/DS169/AB/R, [175]–[180]; The case is in fact an example of a strict form of necessity testing, where the AB, arguably impermissibly, did not accept Korea’s view of the level of protection it pursued or the availability of alternative measures. The AB did not include in its analysis an assessment of the relative importance of the goal pursued by Korea: Regan, *ibid* 360–361.

²⁰⁵ Van den Bossche, *ibid* 290–1; Pirker (n 4) 290; Erich Vranes, *Trade and the Environment: Fundamental Issues in International Law, WTO Law, and Legal Theory* (OUP 2009) 274–6; See also Regan, *ibid* 352–3 (suggesting an additional degree of deference is appropriate for measures pursuing important interests because the harm of an improper invalidation in these cases is greater).

²⁰⁶ *European Communities–Measures Affecting Asbestos and Asbestos-Containing Products–Report of the Appellate Body* (WT/DS135/AB/R, 12 March 2001) [172]; *Brazil–Tyres* (n 200) [179].

²⁰⁷ *EC–Asbestos* (n 206) [173]–[175]; *Brazil–Tyres*, *ibid* [210]–[212] (however the measure did not satisfy the conditions of the chapeau: [217]–[252]).

²⁰⁸ Indeed, the hierarchy of values suggested by this area of WTO practice is that pursuing one of the protected policy goals under Art XX is always permissible, so long as it is done with the least trade-restrictive means: Vranes (n 205) 258.

²⁰⁹ Kati Kulovesi, *The WTO Dispute Settlement System: Challenges of the Environment, Legitimacy and Fragmentation* (Kluwer Law International 2011) 190–6.

²¹⁰ Robert Howse, Joanna Langille and Katie Sykes, ‘Pluralism in Practice: Moral Legislation and the Law of the WTO after Seal Products’ (2015) 48 GWILR 81, 89–91; Kapterian (n 198) 92–3; Michael Ming Du, ‘Autonomy in Setting Appropriate Level of Protection under the WTO Law: Rhetoric or Reality?’ (2010) 13 JIEL 1077, 1101.

The AB has also reduced the potential intrusiveness of necessity testing as a method of review by holding that ‘certain complex public health or environmental problems may be tackled only with a comprehensive policy comprising a multiplicity of interacting measures’ and ‘[i]n the short term, it may prove difficult to isolate the contribution to public health or environmental objectives of one specific measure’.²¹¹ Thus, in *Brazil–Retreaded Tyres* the AB accepted that a measure might be shown to be necessary ‘on the basis of a demonstration that the [measure] is apt to produce a material contribution’, including having regard to future projections based on sufficiently tested hypotheses.²¹² These examples are significant because they show how necessity testing might be softened given the complex policy challenges that are often at stake in environmental cases.

*b) Necessity Testing under TBT Article 2.2*²¹³

In the emerging case law concerning Article 2.2 of the TBT Agreement WTO adjudicators have also adopted least restrictive means testing as the preferred method of review and explicitly refrained from evaluating the relative importance of various objectives pursued by regulating members, as would be involved in full proportionality review.²¹⁴ Article 2.2 requires that members’ technical regulations do not create ‘unnecessary obstacles to international trade’ and are not ‘more trade-restrictive than necessary to fulfil a legitimate objective, taking account of the risks non-fulfilment would

²¹¹ *Brazil–Tyres* (n 200) [151].

²¹² *ibid* [150]–[151]. See also [145]–[146].

²¹³ A version of necessity testing also appears to be developing in recent jurisprudence under TBT Article 2.1. The AB has interpreted the ‘treatment no less favourable’ requirement in Article 2.1 ‘as prohibiting *de jure* and *de facto* discrimination against imported products’ but not a ‘detrimental impact on imports that stems exclusively from a legitimate regulatory distinction’: *United States—Measures Affecting the Production and Sale of Clove Cigarettes—Report of the Appellate Body* (4 April 2012) WT/DS406/AB/R, [175], [181]; To determine whether a detrimental impact on imported products stems exclusively from a legitimate regulatory distinction ‘a panel must carefully scrutinize the particular circumstances of the case, that is, the design, architecture, revealing structure, operation, and application of the technical regulation at issue, and, in particular, whether that technical regulation is even-handed’: [182]. In turn, determining whether a measure is even-handed can involve ‘consideration of the nexus between the regulatory distinctions found in the measure and the measure’s policy objectives, including by examining whether the requirements imposed by the measure are disproportionate in the light of the objectives pursued’: *United States—Measures Concerning the Importation, Marketing and Sale of Tuna and Tuna Products – Report of the Appellate Body (Art 21.5)* (20 November 2015) WT/DS381/AB/R, [7.97], [7.153]; Despite the reference to proportionality in this statement, the earlier statement on which it relies suggests that the focus is on the contribution a measure makes to the goal pursued, having regard to the detrimental impact it imposes on foreign products, without any evaluation of the goal’s relative importance: *United States—Certain Country of Origin Labelling (COOL) Requirements—Reports of the Appellate Body* (29 June 2012) WT/DS384/AB/R, WT/DS386/AB/R, [347]–[348].

²¹⁴ Similarly: *Pirker* (n 4) 321–2; *Howse*, ‘20 Years On’ (n 117) 55.

create’.²¹⁵ In interpreting this provision the AB has drawn a parallel with the ‘holistic weighing and balancing’ test consolidated in *Brazil-Retreaded Tyres*,²¹⁶ noting that ‘a comparison with reasonably available alternative measures is a conceptual tool for the purpose of ascertaining whether a challenged measure is more trade restrictive than necessary’.²¹⁷ Regarding the factors to be taken into account in this exercise the AB summarised in *US-Tuna II*, a long-running dispute concerning ‘dolphin-safe’ labelling requirements imposed by the US, that:

A panel should begin by considering factors that include: (i) the degree of contribution made by the measure to the legitimate objective at issue; (ii) the trade-restrictiveness of the measure; and (iii) the nature of the risks at issue and the gravity of consequences that would arise from non-fulfilment of the objective(s) pursued by the Member through the measure. In most cases, a comparison of the challenged measure and possible alternative measures should be undertaken. In particular, it may be relevant for the purpose of this comparison to consider whether the proposed alternative is less trade restrictive, whether it would make an equivalent contribution to the relevant legitimate objective, taking account of the risks non-fulfilment would create, and whether it is reasonably available.²¹⁸

In applying this test, the AB has emphasised that members are free to select the legitimate policy goals they pursue, and the degree to which they do so, and has avoided any situation where adjudicators would weigh the relative importance of goals pursued by members. For example, in the recent *US-COOL (21.5)* case – which concerned labelling aimed at providing consumer information on the origin of meat products, but would apply equally to eco-labelling – the AB repeatedly stressed that any proposed alternative measure must achieve ‘an *equivalent* degree of contribution to the relevant legitimate objective’.²¹⁹ The AB emphasised that the phrase ‘taking account of the risks non-fulfilment would create’ in Article 2.2 could not lessen the degree of contribution needed for an alternative measure to qualify as equivalent, as this could ‘erode the principle that

²¹⁵ TBT Agreement, Art 2.2.

²¹⁶ *United States–Certain Country of Origin Labelling (COOL) Requirements–Reports of the Appellate Body (Art 21.5)* (18 May 2015) WT/DS384/AB/RW, WT/DS386/AB/RW, [5.198], [5.203]–[5.204].

²¹⁷ *US–Tuna II (AB)* (n 119) [320]. See generally [317]–[321].

²¹⁸ *Ibid* [322].

²¹⁹ *US–COOL (AB Art 21.5)* (n 216) [5.201].

a member' can choose their own level of protection for legitimate non-trade objectives.²²⁰ Furthermore, the AB rejected the argument that the relative importance of the objective pursued by a technical regulation – compared to other legitimate objectives – could be taken into account as part of the 'risks non-fulfilment would create'.²²¹ Again, the wider point is that necessity or least restrictive means testing is a well-established method of review in WTO adjudication, and WTO adjudicators have avoided weighing the relative importance of different policy aims pursued by members, as would be involved in full proportionality review.

c) Necessity Testing under SPS Article 5.6

WTO adjudicators have also utilised least restrictive means testing in interpreting Article 5.6 of the SPS Agreement which requires that SPS measures must not be 'more trade-restrictive than required to achieve their appropriate level of ... protection, taking into account technical and economic feasibility'.²²² The footnote to Article 5.6 adds that:

a measure is not more trade-restrictive than required unless there is another measure, reasonably available taking into account technical and economic feasibility, that achieves the appropriate level of sanitary or phytosanitary protection and is significantly less restrictive to trade.²²³

Plainly, the wording of the provision suggests least restrictive means testing is the appropriate method of review here.²²⁴

Accordingly, to succeed under Article 5.6, a complainant has to advance scientific evidence to discharge its burden of establishing a *prima facie* case that its proposed

²²⁰ Ibid [5.265]-[5.266]. See also [5.215].

²²¹ Ibid [5.276]-[5.279].

²²² SPS Agreement, Art 5.6; The AB has noted that the more general provision of Article 2.2 – and specifically its requirement that SPS measures are 'applied only to the extent necessary to protect human, animal or plant life or health' – informs Article 5.6: see *Australia–Apples (AB)* (n 176) [339]-[340]; One arguable example of WTO adjudicators' endorsing full proportionality review under SPS Article 2.2 is *Japan–Apples*, where the Panel found that Japan's quarantine measure was 'clearly disproportionate to the risk identified on the basis of the scientific evidence available': *Japan–Measures Affecting the Importation of Apples–Report of the Panel* (15 July 2003) WT/DS245/R, [8.198]; The AB upheld this interpretation, reasoning that the Panel's reference to "clear disproportion" related to the requirement that there be a "rational or objective relationship" between an SPS measure and relevant scientific evidence, in order for the measure to not be 'maintained without sufficient scientific evidence' under SPS Article 2.2: *ibid*, Appellate Body Report (26 November 2003) [163]; Howse argues this is the only deviation from the AB's consistent rejection of full proportionality review: Howse, '20 Years On' (n 117) 59, 62.

²²³ SPS Agreement, Art 5.6, fn 3.

²²⁴ Pirker (n 4) 324.

alternative measure would meet the regulating member's selected level of protection.²²⁵ If this is not shown, the proposed measure does not qualify as a true alternative.²²⁶ Furthermore, unlike the GATT and TBT contexts, where necessity testing focuses on the level of contribution a measure actually achieves,²²⁷ the AB has held that under Article 5.6 the benchmark is the level of protection selected by the member, not that achieved by its measure.²²⁸ This interpretation seeks to respect the '*prerogative*' of a regulating member to select its own level of protection.²²⁹ While the treaty context is specific to SPS measures, the wider point is that least restrictive means testing is a well-established method of review in WTO adjudication, frequently used as a way to determine the permissibility of measures which pursue protected non-trade interests without second-guessing the relative importance of the regulatory aims, or levels of protection, members seek to pursue.

D. The Contribution of WTO Adjudication to Broader Processes of Dispute Resolution: Examples from GATT Article XX Chapeau Jurisprudence

This section analyses how WTO adjudicators have contributed to broader processes of dispute resolution by analysing a specific aspect of the case law which has arisen in the context of applying the so-called 'chapeau test', or second step of justification which must be satisfied in order to rely on the GATT Article XX exceptions.²³⁰ As noted above, this focus is justified because the relevant case law has arisen in prominent environmental disputes, and has been read by many commentators as a desirable example of adjudicators ensuring that the disputing parties observe certain other-regarding procedural values without themselves fully disposing of the dispute.²³¹ For example, Ingo Venzke and

²²⁵ See *Australia–Apples (AB)* (n 176) [364]–[366].

²²⁶ *Ibid* [356]; *Australia–Measures Affecting Importation of Salmon–Report of the Appellate Body* (20 October 1998) WT/DS18/AB/R, [194].

²²⁷ See *US–Tuna II (AB)* (n 119) [317].

²²⁸ See *Australia–Salmon (AB)* (n 226) [200]–[204]; *Australia–Apples (AB)* (n 176) [342]–[344].

²²⁹ *Australia–Salmon* *ibid* [199]. See further [206]–[207].

²³⁰ For comprehensive analysis of the chapeau jurisprudence see Lorand Bartels, 'The Chapeau of the General Exceptions in the WTO GATT and GATS Agreements: A Reconstruction' (2015) 109 AJIL 95.

²³¹ von Bogdandy and Venzke (n 54) 206; Armin von Bogdandy, 'Legitimacy of International Economic Governance: Interpretative Approaches to WTO Law and the Prospects of its Proceduralization' in Stefan Griller (ed), *International Economic Governance and Non-Economic Concerns: New Challenges for the International Legal Order* (Springer 2003) 126–133; Cho (n 64) 150–151, 156–160; Sungjoon Cho, 'Of the World Trade Court's Burden' (2009) 20 EJIL 675, 719; Michael Ioannidis, 'A Procedural Approach to the Legitimacy of International Adjudication: Developing Standards of Participation in WTO Law' 12 (2011) German LJ 1175, 1195–9; Scholarship associated with the global administrative law project has praised such jurisprudence: Richard B Stewart and Michelle Ratton Sanchez Badin, 'The World Trade Organization: Multiple Dimensions of Global Administrative Law' (2011) 9 ICON 556, 571 (with further

Armin von Bogdandy read this aspect of WTO practice as evidence that ‘it may be advisable for international courts to refrain from the substantive interpretation of a contested norm and instead derive from it procedural guidelines that lead to a discursive handling of the conflict by the parties’. They suggest that such an approach ‘pushes the parties to a conflict to resolve their dispute within a process under the guidance of international law and in the shadow of renewed judicial oversight’.²³² Likewise, Sungjoon Cho argues that WTO adjudicators should extend this line of jurisprudence, and ‘encourage parties to continue deliberating and cooperating with each other until they reach a mutually acceptable regulatory solution’, rather than ‘weighing and balancing regulatory details of its own discretion’.²³³ Plainly, these arguments envisage WTO adjudicators contributing to broader processes of dispute resolution, in particular by clarifying the legal framework which applies to the parties’ ongoing interactions.

Under the chapeau to Article XX, measures cannot be applied ‘in a manner which would constitute a means of arbitrary or unjustifiable discrimination between countries where the same conditions prevail, or a disguised restriction on international trade’.²³⁴ The chapeau is, according to the AB, concerned with the ‘manner in which the measure is applied’ and operates to prevent abuse of the Article XX exceptions.²³⁵ The AB has emphasised that Article XX must be applied ‘with due regard both to the legal duties of the party claiming the exception and the legal rights of the other parties concerned’.²³⁶ Thus it has characterised applying the chapeau as involving ‘locating and marking out a line of equilibrium between the right of a Member to invoke an exception under Article XX and the rights of the other Members under varying substantive provisions ... so that neither of the competing rights will cancel out the other’.²³⁷

Turning to the instances of chapeau jurisprudence read by commentators as a desirable form of adjudicatory review, in *US-Gasoline* the US sought to justify the discrimination

references); Eyal Benvenisti, ‘Sovereigns as Trustees of Humanity: On the Accountability of States to Foreign Stakeholders’ (2013) 107 AJIL 295, 318–9.

²³² von Bogdandy and Venzke (n 54) 206.

²³³ Cho (n 231) 717–720.

²³⁴ GATT, Art XX.

²³⁵ *US-Gasoline* (n 11) 22; See however Bartels (n 230) 98–105 (critiquing many aspects of the existing chapeau jurisprudence, including that there is no distinction between the measure and its application, and the issue of abuse of rights concerns the Article XX exceptions as a whole, not the chapeau specifically).

²³⁶ *US-Gasoline* (n 11) 22; *US-Shrimp* (n 12) [156]–[157].

²³⁷ *US-Shrimp* (n 12) [159]; See also *US-Gasoline* (n 11) 18.

involved in its measure by highlighting the administrative difficulties that would be involved in allowing foreign gasoline refiners to establish an individual baseline under its domestic emissions legislation, as was permitted for domestic refiners.²³⁸ The measure was held to fail the chapeau conditions because the US had not adequately pursued ‘the possibility of entering into cooperative arrangements with the governments of Venezuela and Brazil or, if it had, not to the point where it encountered governments that were unwilling to cooperate’.²³⁹ While the US had taken account of the costs involved for domestic refiners in establishing statutory baselines, there was ‘nothing in the record to indicate that it did other than disregard that kind of consideration when it came to foreign refiners’.²⁴⁰ Clearly this interpretation hints at a requirement to seek ‘cooperative arrangements’ and to take into account the costs imposed on exporting members.

The AB added substantial detail to such an approach in *US-Shrimp*. In this case the US conservation measure conditioned access to the US market on the use of turtle excluder devices when harvesting shrimp. The measure was found to be applied in a manner constituting ‘unjustifiable discrimination’ because it effectively required exporting members to adopt a regulatory program that was ‘not merely *comparable*, but rather *essentially the same*,’ as that applied to the US domestic industry, thus creating a ‘rigid and unbending standard’ for gaining certification for export to the US.²⁴¹ Part of the AB’s reasoning was that other policies and measures that exporting countries had adopted to conserve sea turtles – the aim pursued by the US – were not taken into account.²⁴² It was:

not acceptable... for one WTO Member to use an economic embargo to *require* other Members to adopt essentially the same comprehensive regulatory program, to achieve a certain policy goal, as that in force within that Member’s territory, *without* taking into consideration different conditions which may occur in the territories of those other Members.²⁴³

The US was faulted for failing to engage the complaining members ‘in serious, across-the-board negotiations with the objective of concluding bilateral or multilateral agreements for the protection and conservation of sea turtles,’ before enforcing its

²³⁸ *US-Gasoline* (n 11) 25-6.

²³⁹ *Ibid* 27-28.

²⁴⁰ *Ibid* 28.

²⁴¹ *US-Shrimp* (n 12) [163].

²⁴² *Ibid* [163].

²⁴³ *Ibid* [164]. See also [165].

measure.²⁴⁴ The fact that the US ‘had negotiated seriously with some, but not with other Members (including the appellees)’ – leading to the conclusion of one regional convention to address the conservation aim pursued – was central to the finding of unjustifiable discrimination. It provided ‘convincing demonstration that an alternative course of action was reasonably open to the United States’.²⁴⁵ The AB also emphasised that compared to 14 countries that were offered a ‘phase in’ period of three years to comply with the US measure, other countries, including the appellees, had a four-month phase in period, resulting in a heavier regulatory burden, and received less technology transfer assistance.²⁴⁶

In the subsequent compliance proceedings the AB clarified that in order to avoid ‘arbitrary or unjustifiable discrimination’ an importing member must engage in comparable negotiations with all exporting members, ‘in the sense that comparable efforts are made, comparable resources are invested, and comparable energies are devoted to securing an international agreement’, even if an agreement is secured with one group of countries but not another.²⁴⁷ The AB reasoned, understandably, that the chapeau test could not require that the US conclude a multilateral agreement with all its trading partners.²⁴⁸ On the facts the US was found to have engaged in ‘serious good faith efforts’ to negotiate an international agreement, meaning its policy was no longer applied in a manner that constituted unjustifiable or arbitrary discrimination.²⁴⁹ The AB also emphasised that the revised US measure allowed for certification on the basis that an exporting member engaged in conservation efforts of comparable effectiveness,²⁵⁰ and, in case of

²⁴⁴ Ibid [166].

²⁴⁵ Ibid [171]-[172].

²⁴⁶ Ibid [173]-[175]. The AB’s finding that the manner in which the US measure was applied also constituted ‘arbitrary discrimination’ emphasised that members whose application to the US authorities for certification were rejected were ‘denied basic fairness and due process’, and were ‘discriminated against, vis-à-vis those Members ... granted certification’: [181], including because there was ‘no formal opportunity for an applicant country to be heard, or to respond to any arguments that may be made against it’, and ‘no formal written, reasoned decision’ was given, nor was there any appeal procedure: [180].

²⁴⁷ *US-Shrimp (Art 21.5)* (n 12) [122]; In contrast, in *US-Gambling* the AB refused to read an obligation to consult with other members into the test of whether measures are ‘necessary’ to protect public morals under GATS Article XIV(a): *US-Gambling* (n 197) [317]. While the Panel had concluded that the US had not established that its measure was necessary, as it had not pursued the possibility of a negotiated outcome with Antigua, the AB reasoned that such an alternative measure was not reasonably available as ‘consultations are by definition a process, the results of which are uncertain’: *ibid* [315]-[317].

²⁴⁸ *US-Shrimp (Art 21.5)* (n 12) [123].

²⁴⁹ Ibid [133]-[134].

²⁵⁰ Ibid [147].

unsuccessful applications, provided for the giving of reasons and the provision of further information by the exporting member.²⁵¹

Clearly, the above jurisprudence demonstrates a concern for ensuring regulating states have considered the interests of affected foreigners and observed due process guarantees. However, as others have pointed out, the AB has not held that the chapeau imposes a free-standing obligation to negotiate. Rather such factors are being used to determine whether there has been unjustifiable or arbitrary discrimination, as prohibited by the chapeau to Article XX, which remains the key focus.²⁵² For example, in *US-Shrimp*, the key to the AB's finding of unjustifiable discrimination was that the US had not negotiated as seriously with, and thus treated equally, the complaining members as compared to other states in the Western hemisphere.²⁵³ Similarly, in *EC-Seals*, the AB, in its analysis of why the EU's measures failed the conditions of the chapeau, emphasised that the EU had not made "comparable efforts" to facilitate the access of the Canadian Inuit to the exception, within its regulatory regime, for seal products produced by indigenous communities as it had for the Greenlandic Inuit, and had not 'pursued cooperative arrangements' in this regard.²⁵⁴

Furthermore, while the chapeau test is more focused on "how" a given measure should be applied, rather than "what" the measure should be,²⁵⁵ there are some important qualifications to bear in mind regarding the apparently procedural and other-regarding style of adjudicatory review emerging from this jurisprudence. As was noted above in considering debates over the standard of review, the idea of an entirely procedural, or substance-neutral, form of adjudicatory review is an illusion, because difficult normative choices must still be made about what counts as an acceptable domestic-level process. In the context of the chapeau jurisprudence such choices concern which interests deserve participation rights, or how far WTO adjudicators should go in encouraging multilateral cooperation.²⁵⁶ There is also some risk that 'processes can be manipulated to give the appearance of consideration of affected foreigners without in any way modifying a

²⁵¹ Ibid [147].

²⁵² See Robert Howse, 'The Appellate Body Rulings in the Shrimp/Turtle Case: A New Legal Baseline for the Trade and Environment Debate' (2002) 27 Columbia JEL 491, 505–7; Bartels (n 230) 122–3.

²⁵³ Howse, *ibid* 506–7.

²⁵⁴ *EC-Seals* (n 201) [5.337].

²⁵⁵ Cho (n 231) 719.

²⁵⁶ See Lang (n 184) 345–8.

predetermined outcome'.²⁵⁷ However, this risk is not unique to the WTO practice, or even international adjudication, but one that can arise whenever an international decision-maker seeks to ensure that domestic decision-makers observe certain procedural values.

Nevertheless, despite these caveats, commentators are correct to highlight that cases such as *US-Shrimp* and *US-Gasoline* contain promising signs of international adjudication acting as a mechanism for encouraging regulating states to pursue cooperative solutions and consider the interests of affected foreigners. The idea of a prospectively focused style of international adjudicatory review, which lays down certain conditions that a regulating state must observe, fits particularly well within the WTO context where members get an opportunity to bring their practices into compliance after adjudication occurs. As noted above, the AB's practice of focusing its scrutiny on the fine detail of a measure allows a member the opportunity to fine-tune its measure to bring it into compliance.²⁵⁸ As we saw in *US-Shrimp* the US had the opportunity revise its measure to satisfy the procedural values which the AB had clarified in its interpretation of the chapeau.²⁵⁹ In this way, disputes are ultimately resolved by the parties through negotiation in the shadow of adjudicatory guidance.²⁶⁰

E. Conclusion

This chapter has analysed how the three pressing problems focused on by this thesis are experienced within WTO environmental adjudication. In numerous respects, the above analysis demonstrates that the practices reviewed are heavily shaped by contextual features particular to the WTO. Yet the practices analysed also provide a number of insights into key problems facing international adjudicators more generally, and legal techniques that are potentially transferable to other contexts. In short, the analysis conducted in this chapter furthers our understanding of the specific context and constraints which inform WTO adjudication, and constitutes an important step in answering the overall inquiry into how contemporary adjudicators might discharge their roles.

²⁵⁷ Gregory Shaffer and Joel P Trachtman, 'Interpretation and Institutional Choice at the WTO' (2011) 52 *Va JIL* 103, 151–2.

²⁵⁸ See above n 117.

²⁵⁹ Highlighting that the US was left autonomy to revise its measure to satisfy the procedural values set out in the original AB report: Ioannidis (n 231) 1195–9.

²⁶⁰ See above n 116; Howse, '20 Years On' (n 117) 75.

The relevant treaty texts clearly shaped how the more general problems focused on arose and were managed. For example, the question of how factual changes affected members' obligations under the SPS Agreement reflected particular provisions of that Agreement which rely on the state of scientific knowledge or require SPS measures to be adapted as conditions change in the territory of an exporting member. Adjudicators' responses to the question of the standard of review under the SPS Agreement were clearly shaped by the prominent role given to science within its provisions. The use of least restrictive means testing across the GATT, TBT and SPS Agreements is supported by the relevant treaty provisions which, with some variations, require measures to be 'necessary' or 'not more trade restrictive than necessary'.²⁶¹ Similarly, the jurisprudence adjudicators developed in applying the chapeau of GATT Article XX, although resembling a duty to cooperate imposed upon the parties, was ultimately tied to the provision's focus on preventing arbitrary or unjustifiable discrimination.

Institutional features of WTO adjudication shape many of the practices observed. The practice across the GATT, TBT, and SPS Agreements of employing a deferential form of least restrictive means testing, rather than full proportionality review, demonstrates that WTO adjudicators have been highly respectful of members' choices of which non-trade goals, and level of protection, to pursue.²⁶² This, in turn, reflects that the WTO is a negative-integration organization, characterised by value-pluralism among its members.²⁶³ The use of a deferential form of least restrictive means testing should also be understood against the background that many of these cases have raised the sensitive question of international scrutiny of domestic measures aimed at protecting environmental or human health interests. WTO dispute settlement has a need, as part of legitimating the wider Organization, to demonstrate that it is consistent with high levels of protection of such interests.²⁶⁴

The idea that adjudicators might contribute to broader processes of dispute resolution by clarifying the legal framework applicable to the parties' ongoing interactions makes particular sense in the WTO context. As was highlighted, in this context remedies are

²⁶¹ See above section C.

²⁶² Howse, '20 Years On' (n 117) 53, 61–62.

²⁶³ See above n 209–210 and text.

²⁶⁴ See above n 43–44 and text.

prospectively focused and adjudication is followed by a diplomatic bargaining process, in which adjudicators' decisions act as a reference point and members get an opportunity to redesign non-compliant measures.²⁶⁵ The diplomatic ethos of the Organization, evident in the formal diplomatic control retained over adjudication and the dominance of legally trained diplomats as adjudicators,²⁶⁶ is highly relevant here. The aim of WTO dispute settlement of curbing unilateralism, and ensuring disputes are resolved within a framework of multilateral supervision, also supports this characterisation of WTO adjudicatory practice.²⁶⁷ Future chapters will show that meaningful comparisons can be drawn between the GATT Article XX chapeau jurisprudence considered and developments in UNCLOS and ICJ adjudication. In those contexts, adjudication has also repeatedly served to clarify the obligations of the disputing parties to cooperate or consider affected foreign interests, and to encourage post-adjudication negotiation or cooperation between the disputing parties. However, important aspects of difference emerge because such jurisprudence has developed in very different treaty and wider institutional contexts.

The cases concerning potential evolution in WTO treaty norms reflect that with the negotiating processes of this regime largely stalled – given the working practice of a consensus requirement – adjudication has been one mechanism for seeking to adjust WTO law, including for attempting to incorporate norms and concerns from other regimes. *US-Shrimp*, and to a lesser degree *EC-Hormones*, are important examples of WTO adjudicators finding room for newly emerged norms of international environmental law within WTO treaties, against the background of major legitimacy concerns, at the time the disputes were decided, regarding the WTO's responsiveness to environmental considerations. The explicit instruction in the DSU that adjudication cannot add to or diminish the rights of members under the covered agreements – which can only be authoritatively interpreted by the Ministerial Conference or General Council – is clearly felt by WTO adjudicators. The strongest evidence of this was the Panel's refusal in *EC-Biotech* to take account of external environmental norms in a way that would arguably alter members' WTO obligations without their consent. Significantly, in both *US-Shrimp* and *EC-Hormones* environmentally sensitive interpretations were presented as present

²⁶⁵ See above n 113-117.

²⁶⁶ Pauwelyn, 'Rule of Law' (n 70) 802.

²⁶⁷ See above n 16.

already within the agreements members had accepted. Related contextual factors which confirm the control retained by members over WTO adjudicators include the practice of criticising controversial AB reports within DSB meetings,²⁶⁸ and the practice of powerful members, and particularly the US, of vetoing (re)appointments to the AB where they disagree with a nominee's adjudicative approach.²⁶⁹

In relation to UNCLOS and ICJ adjudication we will see that adjudicators have also faced the situation of treaty-making largely being stalled and new demands being posed through adjudication, with litigants asking tribunals to incorporate new norms and new concerns into aging treaty frameworks. As in the WTO context, this has raised the question of how to enable a treaty to keep pace with wider developments in international law, while providing legal certainty for, and respecting the consent of, the treaty parties. However, such questions are particularly polarising in the WTO context because despite recognition of non-trade goals in the aims of the WTO, the role of non-WTO law, and particularly multilateral environmental agreements, remains contested and has not been resolved through political processes.²⁷⁰ Given this failure to reach agreement at the political level, WTO adjudicators are understandably reluctant to take a position on such questions because of the potential risks to their ongoing authority.²⁷¹ In contrast, we will see that in key instances where ICJ and UNCLOS adjudicators have adapted treaty frameworks in light of new environmental norms, the relevant treaties were clearly open to such developments, for example because they contained a general obligation to protect the environment. Furthermore, as the next chapter will demonstrate, UNCLOS adjudicators operate within a professional community which has consistently seen marine environmental protection as a key part of its mandate.

Other aspects of the WTO adjudicatory practices considered in this chapter provide guidance or inspiration which can assist adjudicators in other contexts. As demonstrated, WTO adjudicatory practices are well developed on the issues of the standard and method of review, reflecting repeated cases concerning the same treaty provisions and an

²⁶⁸ See above n 65-67, 85 and text.

²⁶⁹ See above n 85-89 and text.

²⁷⁰ Henrik Horn and Petros C Mavroidis, 'Multilateral Environmental Agreements in the WTO: Silence Speaks Volumes' (2014) 10 IJET 147; Andrew Lang, 'Twenty Years of the WTO Appellate Body's "fragmentation jurisprudence"' (2015) 14 JITLP 116, 120-123.

²⁷¹ Lang, *ibid*.

Appellate Body and Secretariat which pursue consistent interpretations across cases. The prominence of these issues within WTO environmental case law is also consistent with the idea that at its core, WTO dispute settlement involves holding members to the agreed trade disciplines while affording them ‘regulatory autonomy’ to pursue diverse policy goals.²⁷² In the following chapters we will see that adjudicators in the other contexts studied have also employed least restrictive means testing as a legal technique for striking a balance between key disciplines imposed by a treaty regime – such as freedom of navigation or investment protection – and other legitimate regulatory aims. The WTO practices considered here, such as not second-guessing the level of protection sought by a regulating member and only considering alternatives that were practically available, can assist adjudicators in other contexts to engage in such balancing exercises without unduly impinging on states’ regulatory autonomy. The WTO debate concerning the standard of review in the SPS context, because it has repeatedly raised the question of adjudicating in the face of competing, factually complex, science-based claims, also offers certain lessons for other regimes. For example, we will see that adjudicators in other regimes have also taken the approach of refraining from engaging in *de novo* review of the underlying scientific or technical determinations relied on by states, but scrutinising the decision-making process employed. Importantly, this aspect of WTO practice reminds us that any meaningful form of international scrutiny requires adjudicators to take a stance on what counts as an adequate domestic decision-making process.

The next chapter will trace the three selected problems within UNCLOS dispute settlement. Certain meaningful and underappreciated aspects of similarity with WTO adjudication will be highlighted, for example concerning managing change within a delicate and wide-ranging multilateral bargain, striking an appropriate balance between international disciplines and regulatory autonomy, and how adjudication might assist the disputing parties to develop a cooperative solution. However, UNCLOS adjudicatory practices exhibit important differences, including because of the quite different interests protected by the regime, the major exceptions to compulsory jurisdiction which exist, and a bench where dissent and a diversity of approaches is common.

²⁷² Howse, ‘20 Years On’ (n 117) 33.

IV. DISPUTE SETTLEMENT IN THE UNITED NATIONS CONVENTION ON THE LAW OF THE SEA

This chapter concerns a sometimes overlooked site of international adjudication, the dispute settlement system created by the United Nations Convention on the Law of the Sea (UNCLOS).¹ UNCLOS was intended as ‘a legal order for the seas and oceans’, which would settle ‘all issues relating to the law of the sea’.² As law of the sea lawyers like to highlight, ‘the oceans cover five-sevenths of the earth’s surface’ and are ‘without doubt the most important resource on the planet’, so the Convention’s importance as the primary instrument governing this space should not be understated.³ The Convention, which currently has 167 parties, is, alongside the WTO agreements, ‘one of the great general regulatory treaties of our time’.⁴ Like the WTO, UNCLOS is notable not only as a major constitutive treaty but also for the dispute settlement procedures it establishes.⁵ Between its conclusion in 1982, its entry into force in 1994, and the present day, UNCLOS has been hailed by many commentators as ‘one of the most far-reaching and complex systems of dispute settlement to be found anywhere in international law’,⁶ and alongside the WTO, one of the key developments in international dispute settlement since the adoption of the UN Charter and ICJ Statute.⁷ Yet, as we will see below, ‘UNCLOS falls significantly short of establishing a truly comprehensive regime of compulsory jurisdiction’,⁸ and thus represents only a partial departure from states’ historical preference for diplomatic rather than adjudicatory forms of dispute settlement.⁹

¹ United Nations Convention on the Law of the Sea (1982) 1833 UNTS 3, Pt XV.

² UNCLOS, preamble.

³ Natalie Klein, *Dispute Settlement in the UN Convention on the Law of the Sea* (CUP 2005) 1.

⁴ *Southern Bluefin Tuna Cases (Australia and New Zealand v Japan) (Jurisdiction and Admissibility)* (2000) 119 ILR 508, [41(l)] (outlining Australian argument).

⁵ Klein (n 3) 1–2.

⁶ Robin Churchill, ‘Some Reflections on the Operation of the Dispute Settlement System of the UN Convention on the Law of the Sea During its First Decade’ in David Freestone, Richard Barnes and David Ong (eds), *The Law of the Sea: Progress and Prospects* (OUP 2006) 388; Jonathan I Charney, ‘Entry Into Force of the 1982 Convention on the Law of the Sea’ (1995) 35 Va JIL 381, 389–90; John E Noyes, ‘Compulsory Third-Party Adjudication and the 1982 United Nations Convention on the Law of the Sea’ (1989) 4 Connecticut JIL 675, 675.

⁷ Alan E Boyle, ‘Dispute Settlement and the Law of the Sea Convention: Problems of Fragmentation and Jurisdiction’ (1997) 46 ICLQ 37, 37; Igor V Karaman, *Dispute Resolution in the Law of the Sea* (Martinus Nijhoff Publishers 2012) 319–20.

⁸ *SBT Award* (n 4) [60]–[62]; Klein (n 3) 41–2.

⁹ See especially Klein (n 3) 350, 362, 367; Shigeru Oda, ‘Dispute Settlement Prospects in the Law of the Sea’ (1995) 44 ICLQ 863, 863.

By analysing the three selected problems in relation to UNCLOS environmental case law this chapter will continue the overall inquiry into how adjudicators might discharge their functions given the demands of the contemporary international legal order and the limitations of their roles. The analysis conducted will enable me to draw a set of conclusions regarding how the particular context in which UNCLOS adjudication occurs shapes the practices reviewed. Factors such as the limited scope of compulsory jurisdiction in this regime, the kinds of competing interests at stake, and the content of relevant treaty provisions all influence how the more general problems focused on by this thesis arise and are managed in UNCLOS adjudication. However, this chapter will also highlight significant and underappreciated elements of similarity or equivalence between UNCLOS adjudication and the other adjudication contexts studied, and reveal new opportunities for comparatively informed learning.

This chapter proceeds as follows. Section A analyses numerous contextual features relevant to understanding adjudication within this regime. Section B analyses how UNCLOS adjudicators have managed the problem of changes in international legal norms or changes in relevant facts. Section C considers how UNCLOS adjudicators have experienced and responded to the problems of the appropriate standard and methods of review by analysing ITLOS' exercise of its prompt release jurisdiction. This focus is appropriate because such cases squarely concern the 'regulatory space' of coastal states and have given rise to pressing questions about the appropriate intensity of adjudicatory review and the legal techniques which might be utilised to balance the competing interests at stake. Such cases are properly seen as environmental cases because they concern the powers of coastal states to take measures to conserve and manage living resources within their Exclusive Economic Zones (EEZ), in the context of the major problem of illegal, unreported and unregulated (IUU) fishing. Section D analyses how UNCLOS adjudicators have contributed to broader processes of dispute resolution within their environmental case law. Section E draws together the key findings arising from the analysis undertaken.

A. Institutional Context for UNCLOS Adjudication

1. The Principle of Compulsory Jurisdiction and its Limitations

A striking feature of the dispute settlement scheme created by Part XV of UNCLOS is that disputes concerning the interpretation or application of the Convention which are not

peacefully resolved through the amicable methods provided for in Section 1 are subject to the compulsory jurisdiction of the applicable UNCLOS court or tribunal.¹⁰ This marks a shift away from the traditional pattern in international law whereby states have typically avoided the compulsory adjudication of their disputes.¹¹ However, the principle has to be appreciated in light of a number of other provisions of Part XV which limit the applicability of the ‘Compulsory Procedures Entailing Binding Decisions’ in Section 2. Nothing in Part XV undermines the right of States Parties to agree to settle disputes concerning UNCLOS by peaceful means of their own choice.¹² Furthermore, two provisions in the Convention envisage that the parties may agree to exclude the jurisdiction of any of the Part XV procedures, and are often invoked to support such an argument by reluctant respondents. Article 281 provides that where the parties to a dispute concerning UNCLOS ‘have agreed to seek settlement of the dispute by a peaceful means of their own choice’, the Part XV procedures ‘only apply where no settlement has been reached by recourse to’ the parties’ chosen means and ‘the agreement between the parties does not exclude any further procedure’.¹³ Article 282 provides that if the parties to an UNCLOS dispute have agreed that such a dispute ‘shall, at the request of any party to the dispute, be submitted to a procedure that entails a binding decision, that procedure shall apply in lieu of the procedures provided for in this Part, unless the parties to the dispute otherwise agree’.¹⁴

Furthermore, significant limitations and exceptions to the compulsory and binding procedures of Section 2 are established by Section 3 of Part XV.¹⁵ Article 297 establishes generally applicable limitations, which remove many matters concerning the rights of coastal states within their EEZs from compulsory jurisdiction.¹⁶ In summary:

¹⁰ UNCLOS, Art 286; Bernard H Oxman, ‘Complementary Agreements and Compulsory Jurisdiction’ (2001) 95 AJIL 277, 286; Note that the jurisdiction of an UNCLOS court or tribunal includes disputes ‘concerning the interpretation or application of this Convention’ (Art 288(1)) but also disputes ‘concerning the interpretation or application of an international agreement related to the purposes of this Convention, which is submitted to it in accordance with the agreement’ (Art 288(2)); There are some seven multilateral agreements on particular areas of the law of the sea concluded since the entry into force of UNCLOS which utilise the dispute resolution mechanisms created by UNCLOS, rather than creating new adjudicatory bodies. See Tullio Treves, ‘A System for Law of the Sea Dispute Settlement’ in Freestone, Barnes and Ong (eds), *The Law of the Sea* (n 6).

¹¹ Klein (n 3) 349.

¹² UNCLOS, Art 280.

¹³ UNCLOS, Art 281; Regarding case law on this provision see text below n 84-88.

¹⁴ UNCLOS, Art 282.

¹⁵ One detailed treatment of these provisions is Klein (n 3) chs 3-4; Recent cases are discussed below, text at n 117ff.

¹⁶ Churchill (n 6) 407.

- Disputes regarding the exercise by a coastal state of its sovereign rights or jurisdiction are subject to the Section 2 procedures where the claim concerns freedoms and rights of navigation, overflight or laying of submarine cables or pipelines, and other internationally lawful uses of the sea.¹⁷
- Claims alleging that the coastal state has contravened international rules for the protection of the marine environment established by UNCLOS, or a competent international organisation under UNCLOS, are also subject to the Section 2 procedures.¹⁸
- For disputes over marine scientific research, disputes concerning the exercise by the coastal state of its discretionary powers within the EEZ are largely excluded from Section 2,¹⁹ although there is provision for non-binding conciliation.²⁰ Marine scientific research on the high seas remains subject to compulsory dispute resolution.²¹
- For fisheries disputes, there is a major exception for disputes regarding a coastal state's sovereign rights over living resources in its EEZ,²² which are only subject to a limited form of non-binding conciliation.²³ In contrast, high seas fisheries disputes are subject to binding dispute settlement.²⁴

Article 298 also enables UNCLOS parties at any time to declare in writing that they do not accept the Section 2 procedures for any of the following categories of dispute:

- Disputes concerning maritime boundary delimitations, or historic bays or titles, although there is provision for non-binding conciliation in some circumstances;²⁵
- Dispute concerning military activities and certain law enforcement activities;²⁶
- Disputes in respect of which the UN Security Council is exercising its functions under the UN Charter.²⁷

¹⁷ UNCLOS, Art 297(1)(a)-(b).

¹⁸ UNCLOS, Art 297(1)(c).

¹⁹ UNCLOS, Arts 297(2)(a), 246, 253.

²⁰ UNCLOS, Art 297(2)(b)-(d), Annex V, Section 2.

²¹ Boyle, 'Fragmentation and Jurisdiction' (n 7) 42–3.

²² UNCLOS, Art 297(3)(a).

²³ UNCLOS, Art 297(3)(b)(c), Annex V, Art 7(2).

²⁴ Boyle, 'Fragmentation and Jurisdiction' (n 7) 42–3.

²⁵ UNCLOS, Art 298(1)(a).

²⁶ See UNCLOS, Art 298(1)(b).

²⁷ See UNCLOS, Art 298(1)(c).

Currently, a minority of UNCLOS parties have made declarations under Article 298.²⁸ As explained below, these generally applicable and optional exclusions reflect that in some areas of the Convention, because of the sensitivity of the interests at stake, states were not willing to accept compulsory, binding dispute resolution.

2. Choice of Dispute Settlement Procedures

For those disputes where the compulsory, binding dispute settlement procedures in Part 2 do apply, states are free to choose, by means of a prior declaration, between: a) ITLOS, created under Annex VI; b) the ICJ; c) a five-member arbitral tribunal constituted under Annex VII; or d) for particular categories of dispute, a special five-member arbitral tribunal constituted under Annex VIII.²⁹ Where a party has not made a declaration, or the parties' declarations do not match, Annex VII arbitration applies unless the parties otherwise agree.³⁰ Only a small fraction of UNCLOS parties have made declarations under Article 287,³¹ meaning that arbitration by an Annex VII Tribunal has emerged as the default mechanism for hearing the merits of disputes where the compulsory, binding procedures apply.³²

3. The Adjudicators in UNCLOS Dispute Settlement

ITLOS is composed of 21 members, appointed for renewable terms of nine years,³³ who must, inter alia, have recognised competence in the law of the sea,³⁴ and be representative of the principal legal systems of the world.³⁵ The qualification requirement is appropriate because ITLOS cases often require detailed knowledge of the drafting history of UNCLOS and related instruments and how they have been implemented at the national level. No two members of ITLOS can be nationals of the same state,³⁶ and at least three members must come from each geographical grouping established in the UN.³⁷ As in the ICJ, on whose Statute ITLOS is modelled, members with the nationality of one of the

²⁸ The declarations are available through the UN Treaties Collection online. For a summary table see: <http://www.un.org/depts/los/settlement_of_disputes/choice_procedure.htm>; Such declarations operate on the principle of reciprocity: UNCLOS, Art 298(3).

²⁹ UNCLOS, Art 287(1).

³⁰ UNCLOS, Art 287(3), (5).

³¹ See above n 28.

³² Churchill (n 6) 397.

³³ UNCLOS, Annex VI, Art 5(1).

³⁴ UNCLOS, Annex VI, Art 2(1).

³⁵ UNCLOS, Annex VI, Art 2(2).

³⁶ UNCLOS, Annex VI, Art 3(1).

³⁷ UNCLOS, Annex VI, Art 3(2).

parties to a dispute are permitted to participate,³⁸ and where the Tribunal does not include a member with the nationality of the parties, the non-represented party or parties are able to nominate ad hoc judges.³⁹ Also following the ICJ model, members have a right to append a separate opinion,⁴⁰ and judgments record the votes of members on each operative provision of the Tribunal's judgment.⁴¹ The result of these arrangements is that ITLOS has a bench that is more diverse than most international tribunals, which has seen a substantial amount of internal debate in the form of separate or dissenting opinions.

ITLOS can also form a special chamber upon the disputing parties' request, the composition of which is determined by the Tribunal with the approval of the parties.⁴² As the parties can effectively agree on the constitution of such a chamber, there is little difference, in terms of control over composition, with the option of Annex VII arbitration.⁴³ ITLOS also has a Seabed Disputes Chamber, composed of 11 members,⁴⁴ which has so far issued one advisory opinion that will be discussed below. This Chamber has jurisdiction over disputes with respect to activities in the International Seabed Area, which is regulated in detail under Part XI of UNCLOS and a 1994 implementing agreement.⁴⁵

Arbitral tribunals constituted under Annex VII consist of five members, with each party able to appoint one member, who may be its national, and the other three members – including the president of the tribunal – being nationals of third states, appointed by agreement.⁴⁶ Where a respondent does not exercise its right to appoint an arbitrator, or the parties cannot agree on the jointly appointed arbitrators or the president of the tribunal,

³⁸ UNCLOS, Annex VI, Art 17(1).

³⁹ UNCLOS, Annex VI, Art 17(2)-(3).

⁴⁰ UNCLOS Annex VI, Art 30(3); ITLOS Rules (2009) Art 125(2).

⁴¹ ITLOS Rules, *ibid* Art 125(1)(l).

⁴² UNCLOS, Annex VI, Art 15(2); ITLOS has also formed certain other chambers, permitted under its Statute, which litigants are yet to utilise: see <<https://www.itlos.org/the-tribunal/chambers/>>.

⁴³ Alan Boyle, 'UNCLOS Dispute Settlement and the Uses and Abuses of Part XV' (2014) 47 RBDI 182, 190–192.

⁴⁴ See UNCLOS, Annex VI, Arts 14, 35.

⁴⁵ Agreement Relating to the Implementation of Part XI of the United Nations Convention on the Law of the Sea of 10 December 1982 (1994) 1836 UNTS 3; Regarding the jurisdiction of the Seabed Chamber see UNCLOS, Arts 187–191.

⁴⁶ UNCLOS, Annex VII, Art 3(a)-(d).

a party can request the appointing authority to make the necessary appointments, who is, unless otherwise agreed, the President of ITLOS.⁴⁷

Special arbitration under Annex VIII has not been used to date. It is available for disputes concerning fisheries, marine environmental protection, marine scientific research, and navigation.⁴⁸ Under this mechanism, the parties can unilaterally appoint two arbitrators, one of whom may have their nationality, with the president appointed by agreement.⁴⁹ Arbitrators are preferably to be chosen from lists of experts maintained by relevant international organisations for each of the subject areas.⁵⁰

4. *Provisional Measures in UNCLOS Adjudication*

It is important to explain the basis for provisional measures in this regime as provisional measures are often requested from ITLOS prior to an arbitral tribunal, which has jurisdiction to hear the merits, being constituted. In such circumstances, ITLOS has the power to grant provisional measures under Article 290(5) ‘if it considers that *prima facie* the tribunal which is to be constituted would have jurisdiction and that the urgency of the situation so requires’.⁵¹ This power must be understood in light of the grounds on which any UNCLOS court or tribunal can grant provisional measures under Article 290(1), specifically that in addition to *prima facie* jurisdiction being shown, provisional measures can be granted where ‘appropriate ... to preserve the respective rights of the parties to the dispute or to prevent serious harm to the marine environment, pending the final decision’.⁵² Compared with a normal grant of provisional measures under Article 290(1), it is more difficult to obtain provisional measures under Article 290(5), pending the constitution of the arbitral tribunal, as the requirement of urgency is stricter. Under Article 290(5) it must be shown that there is the possibility of prejudice to the rights of the parties or serious harm to the marine environment in the period up until the Annex

⁴⁷ UNCLOS, Annex VII, Art 3(c)-(e) (such appointments must come from the list maintained under Article 2).

⁴⁸ UNCLOS, Annex VIII, Art 1.

⁴⁹ UNCLOS, Annex VIII, Art 3(a)-(d).

⁵⁰ Ibid. See further Annex VIII, Art 2(1)-(3).

⁵¹ UNCLOS, Art 290(5).

⁵² See *MOX Plant (Ireland v United Kingdom)* (Provisional Measures, Order of 3 December 2001) ITLOS Reports 2001, 95, Sep. Op. Mensah.

VII tribunal is constituted and in a position to modify, revoke or affirm those measures,⁵³ rather than in the period until the determination of the merits.⁵⁴

5. Prompt Release Procedure

ITLOS also has a limited,⁵⁵ independent, and unique⁵⁶ form of compulsory jurisdiction under Article 292 where one State Party has detained a vessel flagged in another State Party and it is alleged that the detaining state has not complied with provisions of the Convention regarding prompt release of vessels and their crew upon posting of a reasonable bond.⁵⁷ In such circumstances, the flag state can make an application or authorise a private party to make an application on its behalf.⁵⁸ ITLOS then has the task of determining what constitutes a reasonable bond, and once this bond is posted the vessel must be released.⁵⁹ The context for this aspect of UNCLOS adjudication is that the prompt release procedure was intended as one mechanism to prevent coastal states abusing their enforcement powers in the newly established EEZ to the detriment of flag states' interest in freedom of navigation.⁶⁰ There are two key subject-matter areas of the Convention which refer to prompt release of vessels and hence are covered by this procedure.⁶¹ First, the Convention permits coastal states, in the exercise of their sovereign rights to conserve and manage living resources in the EEZ to take measures to enforce their laws adopted under the Convention, including boarding, arrest and judicial proceedings,⁶² and provides

⁵³ See *Case concerning Land Reclamation by Singapore in and around the Straits of Johor (Malaysia v Singapore)* (Provisional Measures, Order of 8 October 2003) ITLOS Reports 2003, 10, [68].

⁵⁴ See *MOX (ITLOS)* (n 52) Sep. Op. Mensah; *Southern Bluefin Tuna Cases (New Zealand v Japan; Australia v Japan)* (Provisional Measures, Order of 27 August 1999) ITLOS Reports 1999, 280, Sep. Op. Treves.

⁵⁵ The UNCLOS court or tribunal is limited to dealing with the question of release, and its determination operates 'without prejudice to the merits of any case' brought at the domestic level against the detained vessel or crew: UNCLOS, Art 292(3).

⁵⁶ *The 'Camouco' Case (Panama v France)* (Prompt Release, Judgment) ITLOS Reports 2000, 10, Sep. Op. Laing.

⁵⁷ UNCLOS, Art 292(1).

⁵⁸ UNCLOS, Art 292(2).

⁵⁹ UNCLOS, Art 292(4).

⁶⁰ See text below n 136.

⁶¹ The better view is that the prompt release procedure is only available in relation to those provisions of the Convention which explicitly refer to prompt release upon the posting of a reasonable bond, ie Articles 73, 220 and 226, and does not cover all instances where coastal states detain a foreign vessel. While the full tribunal left this question open in *M/V 'SAIGA' (Saint Vincent and the Grenadines v Guinea)* (Prompt Release, Judgment) ITLOS Reports 1997, 16, [73], several dissenting judgments outlined compelling arguments for favouring this interpretation: see Diss. Op. Park, Nelson, Chandrasekhara Rao, Vukas and Ndiaye [23]-[24]; Diss. Op. Wolfrum and Yamamoto [15]-[19]; James Harrison, 'Safeguards Against Excessive Enforcement Measures in the Exclusive Economic Zone—Law and Practice' in Henrik Ringbom (ed), *Jurisdiction Over Ships: Post-UNCLOS Developments in the Law of the Sea* (Brill Nijhoff 2015) 238–9.

⁶² UNCLOS, Art 73(1).

for the prompt release of vessels and crew upon the posting of a reasonable bond.⁶³ In practice, this has meant ITLOS has heard numerous prompt release cases concerning vessels detained for violating the fisheries laws of coastal states, in the context of coastal states attempting to combat the major conservation problem of IUU fishing. Second, Part XII of the Convention, dealing with protection and preservation of the marine environment, also permits detention of vessels in certain instances relating to pollution from vessels,⁶⁴ and provides for prompt release⁶⁵ but these provisions have not yet been litigated.⁶⁶

6. *Debating the Purposes of UNCLOS Dispute Settlement*

The purposes of the dispute settlement system contained in Part XV of UNCLOS must be understood in light of the wider goals of the Convention given that Part XV is ‘an integral part and an essential element of the Convention’.⁶⁷ UNCLOS was intended to be a comprehensive ‘legal order for the seas’ that would, inter alia, promote ‘peaceful uses of the seas and oceans, the equitable and efficient utilization of their resources, the conservation of their living resources, and the study, protection and preservation of the marine environment’.⁶⁸ Key aspects of Part XV clearly further goals of the wider regime, such as the power of tribunals to grant provisional measures to ‘prevent serious harm to the marine environment’,⁶⁹ or the unique mechanism for prompt release of detained vessels which prevents undue impingement on the regime’s value of freedom of navigation.⁷⁰ Yet two goals, are, above all, repeated throughout discussions of the aims of UNCLOS dispute settlement. First, the dispute settlement scheme is said to have the purpose of maintaining and adapting the bargain contained in the Convention over time, by providing authoritative mechanisms for resolving disputes regarding its interpretation

⁶³ UNCLOS, Art 73(2).

⁶⁴ UNCLOS, Arts 220(2), 220(6).

⁶⁵ UNCLOS, Arts 220(7), 226(1)(d).

⁶⁶ For analysis see Harrison (n 61) 236–8.

⁶⁷ Shabtai Rosenne and Louis B Sohn (eds), *United Nations Convention on the Law of the Sea 1982: A Commentary*, vol 5 (Martinus Nijhoff Publishers 1989) [X.4.]; *Republic of the Philippines v People’s Republic of China (Award on Jurisdiction and Admissibility)* (29 October 2015) [2], [224].

⁶⁸ UNCLOS, preamble.

⁶⁹ UNCLOS, Arts 290(1), 290(5).

⁷⁰ See below text at n 136-139.

and some international control over its implementation by States Parties.⁷¹ For example, the first President of the diplomatic conference suggested during negotiations that:

The provision of effective dispute settlement procedures is essential for stabilizing and maintaining the compromises necessary for the attainment of agreement on a convention. Dispute settlement procedures will be the pivot upon which the delicate equilibrium of the compromise must be balanced. Otherwise the compromise will disintegrate rapidly and permanently.⁷²

However, it is important to remember that as, outlined above, the range of disputes actually subject to compulsory, binding dispute settlement under the Convention is carefully limited.⁷³ Mandatory adjudication was seen as necessary to maintain and adapt the bargain contained in some areas of the Convention, such as the compromise struck between coastal state and flag state interests within the newly created EEZ, which represented a major extension of coastal state jurisdiction and created the risk of abuse of enforcement powers.⁷⁴ Yet in other areas compulsory international review of state conduct was deliberately excluded given the sensitivity of the interests at stake, such as for disputes concerning fisheries or scientific research in the EEZ,⁷⁵ and the optional exclusion for maritime boundary delimitation.⁷⁶

A second key goal of UNCLOS dispute settlement is to provide peaceful means of dispute settlement, which was intended to reduce the role of political, economic and military pressure in resolving disputes.⁷⁷ These ideas find some support in UNCLOS' preamble, which refers to the Convention as contributing to international peace, security and cooperation.⁷⁸ In this vein, the final President of the diplomatic conference, reflecting at the time of the Convention's conclusion on the achievements of some thirteen years of

⁷¹ Boyle, 'Fragmentation and Jurisdiction' (n 7) 38–9; Rosenne and Sohn (n 67) [X.4.]; AO Adede, *The System for Settlement of Disputes under the UN Convention on the Law of the Sea* (Martinus Nijhoff 1987) 241.

⁷² Hamilton Shirley Amerasinghe, 'Memorandum by the President of the Conference on document A/CONF.62/WP.9' in *Official Records of the Third United Nations Conference on the Law of the Sea*, vol. V (United Nations) 122, UN Doc A/CONF.62/WP.9/Add.1.

⁷³ Oda (n 9) 863; Klein (n 3) 28; See also Shirley Scott, 'The Contribution of the LOS Convention Organizations to its Harmonious Implementation' in Alex G Oude Elferink, and Donald R Rothwell (eds), *Oceans Management in the 21st Century: Institutional Frameworks and Responses* (M Nijhoff 2004) 318 (UNCLOS 'only a little different' from the situation of the ICJ which lacks any compulsory jurisdiction).

⁷⁴ Boyle, 'Fragmentation and Jurisdiction' (n 7) 46–7; Klein (n 3) 353–4.

⁷⁵ Noyes (n 6) 687.

⁷⁶ Klein (n 3) 28, 355–358; Boyle, 'Fragmentation and Jurisdiction' (n 7) 42.

⁷⁷ Klein (n 3) 25; Rosenne and Sohn (n 67) [X.4.]; Adede (n 71) 241.

⁷⁸ See UNCLOS, preamble recitals 1, 3 and 7.

negotiations, noted that ‘the world community’s interest in the peaceful settlement of disputes and the prevention of force in the settlement of disputes between States have been advanced by the mandatory system of dispute settlement in the Convention’.⁷⁹ As we have seen in Chapter One, peaceful dispute settlement is a generic function of international courts.⁸⁰

Amongst law of the sea lawyers one can distinguish between a ‘substantive ... regime building conception’ of UNCLOS whereby the ‘Convention stands at the heart of the public order of the oceans, and compulsory jurisdiction is integral to that public order’, and a more consent-oriented ‘procedural model’ whereby the ‘Convention is to be implemented by political arrangements that translate its general principles into precise legal measures, and compulsory jurisdiction is ancillary to the system of political institutions established to implement those principles’.⁸¹ Those favouring the first narrative emphasise that states, by becoming party to UNCLOS, automatically consent to the adjudication of ‘most disputes concerning its interpretation and application’.⁸² Compulsory binding dispute settlement, as we have seen, is said to be necessary to maintain and adapt the bargain contained in the Convention over time, and to ensure that a rule-oriented system, centred on the Convention, is not overwhelmed by power politics. Yet as noted above a competing, more qualified perspective correctly highlights that the system of compulsory jurisdiction in UNCLOS is carefully limited to some areas but not others.⁸³

It is useful to note these contrasting views because they are frequently on display in UNCLOS adjudication. For example, in the *Southern Blue Fin Tuna (SBT)* cases, where an Annex VII Tribunal controversially held that a regional fisheries agreement between the parties operated to implicitly exclude the UNCLOS dispute resolution procedures under Article 281 of the Convention, the majority supported this finding by emphasising that ‘UNCLOS falls significantly short of establishing a truly comprehensive regime of

⁷⁹ T.T.B. Koh, ‘Statement by the President’ in *Official Records of the Third United Nations Conference on the Law of the Sea*, Vol XVII (United Nations) 13, UN Doc. A/CONF.62/SR.185.

⁸⁰ See above Ch 1 text at n 44ff.

⁸¹ Oxman (n 10) 279.

⁸² Bernard H Oxman, ‘Courts and Tribunals: The ICJ, ITLOS, and Arbitral Tribunals’ in Donald R Rothwell et al (eds), *The Oxford Handbook of the Law of the Sea* (OUP 2015) 415.

⁸³ See especially Klein (n 3) 350, 362, 367; Oda (n 9) 863.

compulsory jurisdiction'.⁸⁴ This reflects the limited 'procedural model' conception of UNCLOS. In contrast, Judge Keith, dissenting, in holding that jurisdiction was not excluded, recounted the familiar narrative of UNCLOS establishing a default rule of compulsory binding dispute settlement,⁸⁵ which is read as a decisive shift away from states' traditional freedom not to submit their disputes to dispute settlement processes.⁸⁶ More recently, an Annex VII Tribunal in the *Philippines v China* case, in overruling the *SBT* majority and holding that Article 281 requires the parties to explicitly exclude the further use of UNCLOS Part XV dispute resolution procedures,⁸⁷ emphasised that UNCLOS is 'a system whereby compulsory dispute resolution is the default rule', which is central to the Convention's object and purpose as 'a comprehensive agreement'.⁸⁸ Again, this is the substantive, regime-building conception of UNCLOS on display.

With this grounding in the context in which UNCLOS dispute settlement occurs, we are now well placed to consider how the three problems facing adjudicators analysed by this thesis are managed in this setting.

B. Balancing Stability and Change in UNCLOS Adjudication

This section analyses how UNCLOS adjudicators have managed the problem of potential changes in relevant international legal norms, or changes in facts which affect the application of such norms. Specifically, I am interested in how they have balanced the competing interests of stability and legal certainty on the one hand, and change and responsiveness to new developments on the other.

1. Managing Changes in International Legal Norms

An excellent example of adjudicators facing the problem of potential change in relevant legal norms is provided by an arbitral award rendered under a regional agreement for the protection of the marine environment concluded pursuant to UNCLOS,⁸⁹ the 1992 Convention for the Protection of the Marine Environment of the North-East Atlantic (OSPAR Convention), as part of the wider *MOX Plant* dispute which produced litigation

⁸⁴ *SBT Award* (n 4) [60]-[62].

⁸⁵ *Ibid*, Sep. Op. Keith [19]-[22].

⁸⁶ *Ibid* [23]-[29].

⁸⁷ *Philippines v China (Jurisdiction)* (n 67) [223].

⁸⁸ *Ibid* [224]-[225].

⁸⁹ See UNCLOS, Arts 197, 237.

before four different international tribunals.⁹⁰ Before the OSPAR Tribunal, Ireland sought to interpret Article 9(3) of the OSPAR Convention, which referred to ‘applicable international regulations’, in light of an extrinsic body of “‘evolving international law and practice on access to environmental information’”. This included the then newly entered into force Aarhus Convention, which both parties had signed but not ratified, and principle 10 of the non-binding Rio Declaration.⁹¹ The majority of the Tribunal noted that it could not ‘go beyond existing law’, and the material could only be drawn on to the extent it constituted customary international law or subsequent practice between the treaty parties.⁹² The concern for respecting legal certainty is readily apparent in the majority’s remark that ‘[a] treaty is a solemn undertaking and States Parties are entitled to have applied to them and to their peoples that to which they have agreed and not things to which they have not agreed’.⁹³ This was immediately followed by acknowledging that the interpreter must, nevertheless, allow treaties to evolve: ‘Lest it produce anachronistic results that are inconsistent with current international law, a tribunal must certainly engage in *actualisation* or contemporization when construing an international instrument that was concluded in an earlier period.’⁹⁴ The rest of the paragraph then stresses the value of legal security again, specifically that any actualisation can only be based on ‘developments in law’, and ‘not material that has not yet become law’.⁹⁵ Accordingly, the majority rejected Ireland’s submission that the unratified Aarhus Convention, or a draft European Community (EC) directive, could inform the meaning of the relevant provisions of the OSPAR Convention.⁹⁶

⁹⁰ OSPAR Convention (1992) 2354 UNTS 67; The *Mox Plant* dispute concerned the United Kingdom’s authorisation of a nuclear facility. In 2001, in addition to bringing a claim before an OSPAR Tribunal, discussed here, Ireland filed an UNCLOS case. Ireland requested provisional measures from ITLOS, pending the constitution of an Annex VII tribunal to hear the merits. Provisional measures different from those requested were granted in December 2001: *MOX (ITLOS)* (n 52); In June 2003, the Annex VII Tribunal decided to suspend further proceedings after numerous European Community law issues arose, essentially concerning the parties competence, as EC members, to bring proceedings before an UNCLOS tribunal: see *MOX Plant Case (Ireland v United Kingdom) (Order No. 3)* (2003) 126 ILR 310, [20]-[30]; In 2006, the European Court of Justice held that as a matter of EC law the parties were not competent to bring the UNCLOS proceedings. Subsequently Ireland withdrew its claim before the UNCLOS arbitral tribunal: see the Tribunal’s Order No. 6, 6 June 2008, available at <<http://pcacases.com/web/view/100>>.

⁹¹ *Dispute Concerning Access to Information under Article 9 of the OSPAR Convention (Ireland v United Kingdom) (Final Award)* (2003) 126 ILR 334, [96]-[98]; Convention on Access to Information, Public Participation in Decision-making and Access to Justice in Environmental Matters (1998) 2161 UNTS 447; Rio Declaration on Environment and Development (1992) 31 ILM 874.

⁹² *OSPAR Award*, *ibid* [100]-[101].

⁹³ *Ibid* [102].

⁹⁴ *Ibid* [103].

⁹⁵ *Ibid*.

⁹⁶ *Ibid* [104]. The Tribunal applied similar reasoning regarding whether Ireland’s claims to information were covered by Article 9(2) of the OSPAR Convention: [180].

A significantly different approach to potential change in the relevant legal norms was developed by Arbitrator Griffith, dissenting. While accepting that the unratified Aarhus Convention was ‘not *ex facie* an instance of binding international law’,⁹⁷ he held that the Convention had ‘relevant normative and evidentiary value’ and could inform the meaning of ‘environmental information’ in Article 9(2) of the OSPAR Convention.⁹⁸ Furthermore, Griffith ‘contest[ed] the failure of the majority to refer to, or to take into account, the adoption’ of an EC directive, after the oral hearings, which transformed the EC legislative proposals into *lex lata* and thus could inform the meaning of the OSPAR treaty term, alongside the Aarhus Convention.⁹⁹ While the approaches of the majority and Arbitrator Griffith diverge, both are dealing with the key problem of how subsequent developments in international law may affect the meaning of the relevant treaty provisions. The difference between them is one of degree, as Arbitrator Griffith was willing to give some weight to an unratified treaty, whereas the majority, in emphasising the importance of material qualifying as law, sought to protect the interest of legal certainty for the parties to the OSPAR treaty. Nevertheless, both approaches recognise that tribunals must interpret treaties agreed at an earlier point in time in conformity with the current international legal order.

Another example of UNCLOS adjudicators adapting the provisions of UNCLOS given changes in international law is provided by the recent *Philippines v China* case. In adjudicating over China’s obligations to protect the marine environment under UNCLOS, the Tribunal had regard to widely ratified environmental treaties to which both the Philippines and China were party. In short, the Tribunal used the external material to confirm that the species at issue were ‘depleted, threatened or endangered species’ and to inform the meaning of the term ‘ecosystem’ under UNCLOS Art 194(5).¹⁰⁰ Given the disputing parties were both parties to the widely ratified treaties relied upon, which were in force, and the relevant terms in UNCLOS were of a highly general nature, this was a relatively uncontroversial instance of responding to subsequent developments in law.

⁹⁷ Ibid, Diss. Op. Griffith [9].

⁹⁸ Ibid [10], [16], [19].

⁹⁹ Ibid [26]-[29]. See also [22]-[25].

¹⁰⁰ *Republic of the Philippines v People’s Republic of China (Award)* (12 July 2016) [945], [956]-[959].

The question of change in relevant international legal norms, given developments in wider international law, also arose repeatedly in the 2011 Advisory Opinion of ITLOS' Seabed Disputes Chamber concerning *Responsibilities and Obligations of States Sponsoring Persons and Entities with respect to Activities in the Area*.¹⁰¹ For example, in considering states' obligation to conduct an environmental impact assessment (EIA), the Chamber initially noted that there was explicit textual support for this obligation in the Regulations, adopted by the International Seabed Authority, which it had to apply.¹⁰² The Chamber then emphasised that the obligation to carry out an EIA applied beyond the provisions of the Regulations, as following the ICJ's judgment in *Pulp Mills*, conducting an EIA is a customary obligation.¹⁰³ Similarly, again drawing on *Pulp Mills*, the Chamber held that in addition to the precautionary approach being a conventional obligation through the Regulations, it was also applicable more generally as an 'integral part' of sponsoring states' due diligence obligation.¹⁰⁴ Accordingly, although the standard contractual clauses set out in the Nodules Regulations did not refer to the precautionary approach – unlike the standard contractual clause in the Sulphides Regulations – nevertheless, states, under their general due diligence obligation, had to take measures to oblige sponsored entities to adopt a precautionary approach.¹⁰⁵

The question of potential change in relevant legal norms also arose when the Chamber considered the obligation to apply 'best environmental practices', which was provided for in the Sulphides Regulations, but not the Nodules Regulations, which referred to the less demanding standard of 'best technology'. The Chamber reasoned that: 'The adoption of higher standards in the more recent Sulphides Regulations would seem to indicate that, in light of the advancement in scientific knowledge, member States ... have become convinced of the need for sponsoring States to apply "best environmental practices"'.¹⁰⁶ Accordingly: 'In the absence of a specific reason to the contrary, ... the Nodules Regulations should be interpreted in light of the development of the law, as evidenced by

¹⁰¹ *Responsibilities and Obligations of States Sponsoring Persons and Entities with respect to Activities in the Area* (Advisory Opinion, 1 February 2011) ITLOS Reports 2011, 10.

¹⁰² Ibid [141]-[144]. On the status of the Regulations see [59]-[60].

¹⁰³ Ibid [147]-[150]. Citing *Pulp Mills on the River Uruguay (Argentina v Uruguay)* (Merits) [2010] ICJ Rep 14, [204]-[205].

¹⁰⁴ *Seabed AO* (n 101) [131], [135].

¹⁰⁵ Ibid [133]-[134].

¹⁰⁶ Ibid [136].

the subsequent adoption of the Sulphides Regulations.’¹⁰⁷ The key point is that in all of these aspects of the case the underlying functional question is one of how the applicable legal standards may evolve in light of relevant developments in international law. The Chamber’s decision strongly favours evolution in relevant legal norms, for example by inferring from a later instrument the parties’ intent as to the current meaning of an earlier instrument. Importantly, the Chamber was able to rely on customary norms, as identified by a recent ICJ judgment, in its interpretation of the relevant UNCLOS instruments. The advisory context of the decision, where there is not the same emphasis on party intent as in contentious cases, also helps explain the approach adopted.

The question of potential change in relevant legal norms also arose in the *SBT* cases, discussed above, at the provisional measures stage before ITLOS, with Australia and New Zealand arguing that the provisions of UNCLOS they invoked had to be interpreted in light of the precautionary principle.¹⁰⁸ As Judge Laing noted, while the Tribunal’s Order did not refer to the precautionary principle, its remarks were ‘pregnant with meaning’,¹⁰⁹ and in practice did adopt a precautionary approach in prescribing provisional measures,¹¹⁰ with the Tribunal acknowledging that there was ‘scientific uncertainty regarding’ appropriate conservation measures,¹¹¹ and that it could not ‘conclusively assess the scientific evidence presented by the parties’.¹¹² Arguably, as Judge Treves noted, because the decision occurred in a provisional measures context, where there is a need to preserve the factual situation until the merits are decided, a precautionary approach could be justified as ‘inherent in the very notion of provisional measures’.¹¹³ Judges Treves, Laing and Shearer also supported the Tribunal’s interpretation by referring to a 1995 implementing agreement under UNCLOS, the Fish Stocks Agreement,¹¹⁴ which adopts a precautionary approach, and at the time of the Order was signed but not ratified by the parties.¹¹⁵ Here, the judges were attempting to justify why the Tribunal’s approach of

¹⁰⁷ Ibid [137].

¹⁰⁸ See Australia’s Request for Provisional Measures, [1], [25], in 4 ITLOS Pleadings 1999, 73.

¹⁰⁹ *SBT Order* (n 54) Sep. Op. Laing [13].

¹¹⁰ Ibid [19], and generally [12]-[19].

¹¹¹ *SBT Order* (n 54) [79].

¹¹² Ibid [80], generally [77]-[80].

¹¹³ Ibid, Sep. Op. Treves [9].

¹¹⁴ Agreement for the Implementation of the Provisions of the United Nations Convention on the Law of the Sea of 10 December 1982 Relating to the Conservation and Management of Straddling Fish Stocks and Highly Migratory Fish Stocks (1995) 2167 UNTS 3.

¹¹⁵ *SBT Order* (n 54) Sep. Op. Treves [10]-[11]; Sep. Op. Laing [20]; Sep. Op. Shearer.

interpreting the relevant provisions of UNCLOS in light of a precautionary approach did not impermissibly undermine legal certainty.¹¹⁶

A final, significant example of the problem of managing potential changes in international legal norms is provided by cases where UNCLOS adjudicators must determine the precise scope of compulsory jurisdiction under Part XV of the Convention, in light of the provision for compulsory dispute resolution subject to ‘carefully and precisely’ defined limitations and exceptions.¹¹⁷ As Alan Boyle has noted, states, as litigants, depending on their interests, seek either to expand or contract the scope of the exceptions to jurisdiction, and a key question facing adjudicators is whether the exceptions remain stable, can evolve in light of developments in international law, or only with the agreement of all parties to UNCLOS.¹¹⁸ The recent Award in the *Chagos Marine Protected Area Arbitration* is an excellent example of this manifestation of the broader problem of how to balance the competing interests of stability and change.¹¹⁹ This case concerned the United Kingdom (UK)’s declaration of a Marine Protected Area (MPA) surrounding the Chagos Archipelago in 2010, in the context of a deeply controversial colonial era dispute with Mauritius regarding sovereignty over the Archipelago. Mauritius contended that the UK was not entitled to declare an MPA because it was not a ‘coastal state’ within relevant provisions of the Convention, or because Mauritius had rights as a ‘coastal state’.¹²⁰ For the UK, accepting Mauritius’ claim risked opening up Part XV ‘to a wide range of latent sovereignty disputes among States worldwide, brought on the pretext that one State or another is not the “coastal State” with respect to the territory in question’, which could deter states from acceding to UNCLOS or accepting the jurisdiction of other international tribunals.¹²¹ In contrast, Mauritius argued that while over time UNCLOS tribunals had been faced with issues that the Convention’s drafters may not have foreseen or liked, “sensible solutions have been found, and the law has evolved”.¹²² For Mauritius, finding

¹¹⁶ Also reading the decision as allowing the relevant provisions of UNCLOS to evolve: Alan Boyle, ‘Further Development of the 1982 Convention on the Law of the Sea: Mechanisms for Change’ in Freestone, Barnes and Ong (eds), *The Law of the Sea* (n 6) 51 fn 55; Irina Buga, ‘Between Stability and Change in the Law of the Sea Convention: Subsequent Practice, Treaty Modification, and Regime Interaction’ in Rothwell et al (eds), *The Oxford Handbook of the Law of the Sea* (n 82) 63.

¹¹⁷ *Philippines v China (Jurisdiction)* (n 67) [224].

¹¹⁸ Boyle, ‘Uses and Abuses’ (n 43) 182–3, 192.

¹¹⁹ *Chagos Marine Protected Area (Republic of Mauritius v United Kingdom) (Award)* (2015) 162 ILR 1.

¹²⁰ *Ibid* [158].

¹²¹ *Ibid* [198].

¹²² *Ibid* [200].

jurisdiction ‘far from undermining the whole Convention,’ would ‘strengthen the dispute settlement structure of the Convention’ whereas declining jurisdiction would ‘signal that Part XV serves to perpetuate a colonial era dispute’.¹²³

The majority of the Tribunal, in concluding that parts of the parties’ dispute were properly characterised as concerning land sovereignty over the Chagos Archipelago, rather than the interpretation or application of UNCLOS, and thus did not fall within its jurisdiction,¹²⁴ placed heavy emphasis on the idea of respect for the intention of the drafters of the Convention and not creating unexpected changes, via interpretation, to the jurisdictional scheme of UNCLOS. The context here was that the parties had debated the drafting history of the exception contained in UNCLOS 298(1)(a)(i), which permits states to exclude disputes regarding sea boundaries from compulsory adjudication, but requires submission to conciliation and further provides that ‘any dispute that necessarily involves the concurrent consideration of any unsettled dispute concerning sovereignty ... over continental or insular land territory’ is excluded from such submission to conciliation.¹²⁵ The majority held that had the drafters intended that land sovereignty disputes could be presented as disputes concerning the interpretation or application of the Convention, they would have included an equivalent ‘opt-out facility for States not wishing their sovereignty claims to be adjudicated’ as that provided in Article 298(1)(a)(i) for maritime delimitation disputes.¹²⁶ For the majority, to accept Mauritius’ argument that the Article 298(1)(a)(i) opt-out in fact showed that ordinarily issues over land sovereignty could fall within the jurisdiction of an UNCLOS tribunal ‘would do violence to the intent of the drafters of the Convention to craft a balanced text and to respect the manifest sensitivity of States to the compulsory settlement of disputes relating to sovereign rights and maritime territory’, sensitivities which were even greater for land territory.¹²⁷

¹²³ Ibid [201].

¹²⁴ Ibid [209]-[212], [221].

¹²⁵ UNCLOS, Art 298(1)(a)(i).

¹²⁶ *Chagos* (n 119) [217], also [215]-[216].

¹²⁷ Ibid [219]; Note that in contrast, in the recent *Philippines v China* Award, while the parties had a wider dispute concerning land sovereignty over certain maritime features, the Philippines’ submissions did not require the Tribunal to determine explicitly or implicitly the contested issue of land sovereignty, and were accepted to be disputes concerning the interpretation or application of UNCLOS: *Philippines v China (Jurisdiction)* (n 67) [151]-[153], generally [151]-[178].

A very different view of how the competing interests of stability and change manifested themselves in this part of the case was articulated by Judges Wolfrum and Kateka, dissenting. They reasoned that so long as the dispute was one concerning the interpretation and application of UNCLOS it was permissible to incidentally decide land sovereignty issues as part of the reasoning in adjudicating an UNCLOS claim.¹²⁸ For Judges Wolfrum and Kateka, the majority approach, far from ensuring legal stability and certainty, had impermissibly introduced a new limitation on the jurisdiction of tribunals under Part XV of UNCLOS, which ‘would change the balance’ embodied in the Convention.¹²⁹ In sum, because the majority and dissenters had different views regarding the scope of the exclusions to compulsory jurisdiction under Part XV, properly interpreted, they advanced different views of what would count as adjudicators respecting the interest of legal certainty, and accused each other of impermissibly altering the bargain agreed by the treaty parties.

2. *Managing Changes in Relevant Facts*

UNCLOS adjudicators have faced the related question of how changes in relevant facts may affect the application of applicable legal norms. For example, in its *2011 Advisory Opinion*, discussed above, ITLOS’ Seabed Disputes Advisory Chamber noted that, as regards the measures to be adopted by sponsoring states to fulfil their due diligence obligation, ‘measures considered sufficiently diligent at a certain moment may become not diligent enough in light, for instance, of new scientific or technological knowledge’,¹³⁰ meaning states should keep ‘such measures ... under review’.¹³¹ Here, while the content of the legal norm remained constant, requiring states exercise due diligence, applying the norm was dependent on certain factual matters, such as the state of scientific knowledge, that were liable to change.

C. *The Standard and Method of Review in UNCLOS Adjudication*

1. *Standard of Review in ITLOS’ Prompt Release Jurisdiction*

ITLOS’ prompt release jurisdiction has given rise to an important debate concerning the appropriate standard or intensity of international adjudicatory review, given the impact

¹²⁸ *Chagos* (n 119) Diss. and Conc. Op. Wolfrum and Kateka, [42], [44]-[45]. See also [28].

¹²⁹ Ibid [44]-[45].

¹³⁰ *Seabed AO* (n 101) [117].

¹³¹ Ibid [222].

on states' regulatory autonomy and their ability to take measures pursuing legitimate regulatory goals endorsed by UNCLOS and other international regimes aimed at conservation. As outlined above,¹³² the relevant treaty context is that for those provisions of UNCLOS which provide for the prompt release of detained vessels and their crews on the posting of a reasonable bond,¹³³ the question of the reasonableness of the bond, determined at the national level by the detaining coastal state, is subject to international judicial review.¹³⁴ In short, an issue that was previously within the domestic discretion of coastal states – the reasonableness of a bond regarding certain fisheries and marine pollution offences – is subject to international supervision.¹³⁵

The background to this provision for international judicial review is that it was recognised when drafting UNCLOS that the establishment of the EEZ constituted a major extension of coastal state jurisdiction, and that the power of coastal states to take enforcement measures, in exercising their sovereign rights to conserve and manage the living resources in their EEZs, raised the risk of abuse to the detriment of flag state interests.¹³⁶ Accordingly, ITLOS has recognised that Articles 73 and 292 establish a 'balance of interests' between the interests of coastal states, in ensuring compliance with their laws, and flag states, in securing the prompt release of vessels and crews, which is to serve as 'the guiding criterion for the Tribunal in its assessment of the reasonableness of the

¹³² Above text at n 55ff.

¹³³ UNCLOS Arts 73(2), 220(7), 226(1)(d). It is not enough for the applicant to simply assert that the coastal state has not complied with these provisions. This issue arose in *Saiga (Prompt Release)* (n 63) where the coastal state argued that none of its actions had been taken pursuant to these provisions, and thus the prompt release procedure was not available. ITLOS as a whole required that allegations that particular provisions of the Convention are involved must be 'arguable' or 'sufficiently plausible': *ibid* [51]; Several dissenting judgments persuasively critiqued this approach, emphasising that ITLOS must determine in a final rather than provisional manner whether the application for prompt release is well-founded. They noted that the burden is on the applicant to demonstrate a genuine connection between the detention of the vessel and measures of the detaining state taken pursuant to provisions of UNCLOS covered by the prompt release procedure: *ibid*, Diss. Op. Park, Nelson, Chandrasekhara Rao, Vukas and Ndiaye [8]-[9]; Diss. Op. Anderson [4]-[5]; Diss. Op. Mensah [5], [7], [18]; Diss. Op. Wolfrum and Yamamoto [4]-[9].

¹³⁴ On the notion of a reasonable bond being an international one, determined by ITLOS, see *Camouco* (n 56) Diss. Op. Treves [4]; Sep. Op. Nelson; Dec. Laing.

¹³⁵ Klein (n 3) 117; Seline Trevisanut, 'The Exercise of Administrative Functions by ITLOS: A Comment on Prompt Release Cases' in Nerina Boschiero et al (eds), *International Courts and the Development of International Law: Essays in Honour of Tullio Treves* (TMC Asser Press 2013) 317.

¹³⁶ Donald R Rothwell and Tim Stephens, 'Illegal Southern Ocean Fishing and Prompt Release: Balancing Coastal and Flag State Rights and Interests' (2004) 53 ICLQ 171, 171, 175-6; There is a variety of other ways, beyond the prompt release procedure, that UNCLOS places limits on the enforcement powers of coastal states within the EEZ and thus strikes a balance with the competing interest of flag states in freedom of navigation. See Harrison (n 61).

bond'.¹³⁷ The point of the prompt release procedure is to ensure that coastal states observe the requirement of setting reasonable bonds.¹³⁸ As Vice-President Nelson has stated, '[t]he notion of reasonableness is here used to curb the arbitrary exercise of the discretionary power granted to coastal States.'¹³⁹

The 'need for judicial restraint at the international level',¹⁴⁰ given the direct impact of ITLOS' prompt release jurisdiction on national-level law enforcement procedures,¹⁴¹ has been highlighted on multiple occasions by individual ITLOS judges. In the *Camouco* case, Judge Wolfrum emphasised that in exercising this form of jurisdiction the international tribunal 'must not unnecessarily impinge upon the enforcement rights of the coastal state', including as the Convention, in providing for prompt release, is explicit that the judgment of the international tribunal is 'without prejudice to the merits of any case before the appropriate domestic forum'.¹⁴² Judge Wolfrum highlighted that 'coastal states enjoy considerable discretion', in establishing and implementing laws for the conservation and management of living resources within the EEZ,¹⁴³ and '[t]hese discretionary powers or margin of appreciation on the side of the coastal State limit the powers of the Tribunal on deciding whether a bond set by national authorities was reasonable or not.'¹⁴⁴ Similarly, in the *Volga* case Judge Cot recognised that a 'margin of appreciation' applies both to measures taken by coastal states to manage living resources in their EEZs, and to the amount of the bond set for prompt release, and '[p]rovided that the bond is not "unreasonable", the Tribunal does not have to substitute its discretion for that of the coastal State.'¹⁴⁵

The *Monte Confurco* case is a prominent example where ITLOS was accused by several judges of adopting an impermissibly strict standard of review in determining the reasonableness of the national-level bond. Here, the national court, in setting the bond,

¹³⁷ *The 'Monte Confurco' Case (Seychelles v France)* (Prompt Release, Judgment) ITLOS Reports 2000, 86, [70]-[72]; Affirmed in *'Volga' (Russian Federation v Australia)* (Prompt Release, Judgment) ITLOS Reports 2002, 10, [65].

¹³⁸ *Monte Confurco* (n 137) [74].

¹³⁹ *Ibid*, Sep. Op. Nelson.

¹⁴⁰ *Camouco* (n 56) Diss. Op. Anderson.

¹⁴¹ Trevisanut (n 135) 312.

¹⁴² *Camouco* (n 56) Diss. Op. Wolfrum [8], citing UNCLOS Art 292(3).

¹⁴³ *Ibid* [11]-[12].

¹⁴⁴ *Ibid* [11].

¹⁴⁵ *Volga* (n 137) Sep. Op. Cot, [22]; Judge Anderson has also applied the concept of a 'margin of appreciation': *Volga*, Diss. Op. Anderson [23]; *Monte Confurco* (n 137) Diss. Op. Anderson.

had considered a presumption, common in national laws,¹⁴⁶ that because the vessel failed to notify its entry into the EEZ, all fish on board are presumed to be caught illegally, and determined that the potential fines might correspond to half the fish on board being caught illegally.¹⁴⁷ ITLOS held that ‘the assumption of the [national] court’ was not ‘entirely consistent with the information before’ it which did not ‘give an adequate basis to assume that the entire catch on board, or a substantial part of it, was taken in the’ EEZ.¹⁴⁸ This was despite France, as respondent, having led expert evidence to show that the fish on board could not have been caught in the areas outside the EEZ where the applicant claimed.¹⁴⁹ ITLOS’ finding is problematic given the de novo review of relevant factual issues it suggests and the limited capacity of an international tribunal to be appraised of such issues. Judge Jesus highlighted that it was not within ITLOS’ competence ‘to anticipate and therefore preclude the domestic court’s positions on these very important aspects on the merits of the case’, and that the international tribunal ‘did not have before it enough evidence to conclude in one way or the other’.¹⁵⁰ Similarly, Judge Mensah criticised the Tribunal’s approach for suggesting that ‘it is necessary or appropriate for it to receive evidence and make determinations’ on such issues, holding ‘that any “examination” of the facts must be limited to what is strictly necessary for an appreciation of the reasonableness’ of the coastal state measures.¹⁵¹

ITLOS adjudicators have also been faced with the question, in determining the appropriate standard of review, of reviewing state measures pursuing legitimate regulatory aims endorsed by other international regimes. UNCLOS itself does not lay out any criteria for determining the reasonableness of the bond in the prompt release setting, and ITLOS has outlined a number of non-exhaustive relevant factors, including ‘the gravity of the alleged offences, the penalties imposed or imposable under the laws of the detaining State, the value of the detained vessel and of the cargo seized, the amount of the bond imposed by the detaining State and its form’.¹⁵² The issue of coastal states’ regulatory autonomy came to a head in the *Volga* case, where Australia argued that the problem of IUU fishing in the Southern Ocean and related international concern, as

¹⁴⁶ *Monte Confurco* (n 137) Diss. Op. Anderson.

¹⁴⁷ *Monte Confurco* (n 137) [87].

¹⁴⁸ *Ibid* [88].

¹⁴⁹ *Ibid* [54], generally [47]-[55].

¹⁵⁰ *Ibid*, Diss. Op. Jesus [28], also [10], [13].

¹⁵¹ *Ibid*, Dec. Mensah.

¹⁵² *Camouco* (n 56) [67]; *Monte Confurco* (n 137) [76].

evidenced through measures taken under the Convention on the Conservation of Antarctic Marine Living Resources (CCAMLR), justified its conduct. The Tribunal briefly noted these concerns before finding that '[i]t is by reference to' the penalties applicable under the domestic laws of the detaining state, 'that the Tribunal may evaluate the gravity of the alleged offences'.¹⁵³

An alternative approach giving greater weight to the wider multilateral context for Australia's measures was outlined by several individual judges. Judge Cot emphasised that Australia's measures 'should be seen within the context of a concerted effort within the FAO [Food and Agriculture Organization] and CCAMLR' to combat IUU fishing, and that this multilateral context widened Australia's margin of appreciation.¹⁵⁴ Similarly, Judge Anderson emphasised that the 'the obligations of Contracting Parties to CCAMLR to protect the Antarctic ecosystem,' as well as the 'duty of the coastal State to ensure the conservation of the living resources of the EEZ' under Article 61 of UNCLOS, needed to be considered in determining the reasonableness of a bond.¹⁵⁵ Judge ad hoc Shearer also suggested that 'national courts must take into account the gravity not only of the particular offence but also of the effects of offences generally on the conservation efforts of the international community. ...The Tribunal, and other international courts and tribunals, should be fully aware, and supportive, of these aims'.¹⁵⁶ This is the valid argument, also seen in other contexts, that where a measure is taken by a regulating state pursuant to another international regime, or is consistent with international practices, this can inform the standard of review applied.¹⁵⁷ ITLOS' narrow approach to the factors relevant to assessing the reasonableness of bonds is likely based on a view regarding the limited scope of the prompt release procedure and its purpose of securing the release of a vessel

¹⁵³ *Volga* (n 137) [68]-[69]; Affirmed in '*Juno Trader*' (*Saint Vincent and the Grenadines v Guinea-Bissau*) (Prompt Release, Judgment) ITLOS Reports 2004, 17, [89]; Another controversial aspect of the *Volga* Judgment was the Tribunal's finding that non-financial conditions imposed by Australia, designed to secure future compliance with fisheries laws, were not permitted by UNCLOS Article 73(2): *ibid* [75]-[80]; Judge ad hoc Shearer criticised the Tribunal for failing to take 'full account of the measures ... found necessary by many coastal States' given 'catastrophic declines' in fish stocks: Diss. Op. Shearer [17]; See also Diss. Op. Anderson [14]-[23] (permitting non-financial conditions); Sep. Op. Cot [26]-[28] (rejecting non-financial conditions).

¹⁵⁴ *Volga* (n 137) Sep. Op. Judge Cot, [12].

¹⁵⁵ *Ibid*, Diss. Op. Anderson [2]; Similarly: *Camouco* (n 56) Diss. Op. Anderson.

¹⁵⁶ *Volga* (n 137) Diss. Op. Shearer [11].

¹⁵⁷ See eg *Chemtura Corporation (formerly Crompton Corporation) v Canada (Award)* (UNCITRAL (NAFTA) 2 August 2010) [135]-[138] (Tribunal emphasised that Canada's measure taken pursuant to its international obligations and international concern regarding the relevant substance, not in bad faith). Discussed below Ch VI, text at n 157-163.

and crew in a timely manner. Yet as the individual opinions suggested, the majority approach places insufficient emphasis on the wider multilateral conservation context for coastal state measures,¹⁵⁸ and tends to result in an overly intrusive form of judicial review.

2. *Methods of Review in UNCLOS Adjudication*

In reviewing coastal state measures for compliance with international norms UNCLOS adjudicators have repeatedly faced the issue of balancing competing interests, both protected by the relevant legal regime, and have utilised methods of review which are shaped by the relevant context but also exhibit significant similarities to the legal techniques utilised in response to this challenge in other settings. While the methods of review are not fully settled within this context, UNCLOS adjudicators have utilised variants of necessity testing and full proportionality review in reviewing state measures that pursue a protected aim, for example combatting IUU fishing, but also undermine other protected interests, such as freedom of navigation.¹⁵⁹ In the prompt release setting, ITLOS as a whole has held, in rather open-ended terms, that ‘the amount of the bond should be proportionate to the gravity of the alleged offences’.¹⁶⁰ More concretely, Judge Cot has noted the obligation of a coastal state ‘to ensure that its conduct is proportional to the aim being legally pursued, account being taken of the rights and freedoms granted to others or acknowledged under international law’.¹⁶¹ Judge Laing has also noted the potential for drawing inspiration from the form of necessity testing developed in GATT Article XX jurisprudence.¹⁶²

The discourse on the appropriate standard and method of review in this setting was developed considerably by ITLOS’ 2014 judgment in the *M/V ‘Virginia G’ Case*.¹⁶³ This case concerned the confiscation by Guinea-Bissau of a vessel engaged in ‘bunkering’ or refuelling fishing vessels in its EEZ, but did not come to the Tribunal under the prompt release procedure. Accordingly, the case was not confined to the question of the reasonableness of a bond set by the coastal state. Nevertheless, the example is highly pertinent as the debate within ITLOS squarely concerned the regulatory powers of the

¹⁵⁸ See especially Klein (n 3) 111–2; Trevisanut (n 135) 314–5.

¹⁵⁹ See *Monte Confurco* (n 137) Diss. Op. Laing [6], [7]–[9].

¹⁶⁰ *‘Hoshinmaru’ (Japan v Russian Federation)* (Prompt Release, Judgment) ITLOS Reports 2005–2007, 18, [88]; See also *Juno Trader* (n 153) [89].

¹⁶¹ *Volga* (n 137) Sep. Op. Cot [21].

¹⁶² *Monte Confurco* (n 137) Diss. Op. Laing [3] fn2.

¹⁶³ *M/V ‘Virginia G’ (Panama/Guinea-Bissau)* (Judgment) ITLOS Reports 2014, 4.

coastal state, and the appropriate methods and intensity of international judicial review.¹⁶⁴ ITLOS began by finding that coastal states have the power to regulate bunkering of foreign vessels fishing in the EEZ, as part of their right to conserve and manage the living resources in the EEZ.¹⁶⁵ However, in applying Article 73(1) of the Convention, which entitles coastal states to take measures ‘necessary to ensure compliance with’ such conservation laws, ITLOS controversially held that one of the enforcement measures taken by Guinea-Bissau pursuant to its legislation – confiscation – was not ‘necessary’ and violated the provision.¹⁶⁶ Some nine judges of ITLOS dissented from this finding, and criticised the majority for engaging in an inappropriately intense form of international judicial review.

A joint dissenting opinion of six judges held that ‘international tribunals should exercise judicial restraint in dealing with the coastal State’s discretionary powers under article 73, paragraph 1, of the Convention’, since ‘national courts or authorities are better placed to appreciate all the relevant considerations of law and fact ... Hence, they should be given a broad “margin of appreciation”’.¹⁶⁷ They accused the majority of overstepping the limited role of judicial review and functioning ‘as an appellate authority substituting its judgment for that of the local authority’.¹⁶⁸ These judges emphasised that but for the limitation on the coastal state’s enforcement powers under UNCLOS Article 73(1), the issue would have rested entirely within the discretion of the coastal state, and the provision’s reference to the coastal state’s ‘sovereign rights’ in managing living resources in the EEZ warranted deference.¹⁶⁹ The idea that national-level decision-makers may be ‘better placed to appreciate all the relevant considerations of law and fact’ is a standard justification for affording national-level decision-makers a degree of deference utilised across all of the adjudication contexts studied.¹⁷⁰ Judge ad hoc Sérvulo Correia, dissenting, also suggested the Tribunal had engaged in an inappropriately intense form of

¹⁶⁴ Another recent case where the Tribunal held certain enforcement measures by the coastal state were disproportionate is *The Duzgit Integrity Arbitration (Malta v São Tomé and Príncipe) (Award)* (5 September 2016) [254]-[261]; Contrast the Dissenting Opinion of Judge Kateka [9]-[28] (emphasising the deference owed to the coastal state).

¹⁶⁵ *M/V ‘Virginia G’* (n 163) [217], [223].

¹⁶⁶ *Ibid* [265]-[271].

¹⁶⁷ *Ibid*, Joint Diss. Op. Hoffmann, Marotta Rangel, Chandrasekhara Rao, Kateka, Gao and Bouguetaia [50].

¹⁶⁸ *Ibid* [54]-[55].

¹⁶⁹ *Ibid* [49]-[50]; Similarly: Harrison (n 61) 222.

¹⁷⁰ This is drawn together in the conclusion, below Ch VII(B)(1).

judicial scrutiny, and judicial deference was warranted unless it was ‘manifest or absolutely clear that a less intrusive or onerous measure would have been equally suitable and effective in attaining the legal aim’.¹⁷¹ His suggested approach is in substance simply a least restrictive means test, where one only accepts a proposed alternative measure as a true alternative if it would be equally effective in achieving the relevant regulatory aim.

Judge Paik, while agreeing with the majority that the coastal state’s measure was not ‘necessary’ in the circumstances, placed the issues in their wider comparative perspective, noting that ‘necessity is employed in a great number of areas of international law’ and attempts to balance a state’s pursuit of a legitimate objective against undue infringement on other protected rights.¹⁷² He further noted that the issue of the standard of review arises across international adjudication and ‘an important consideration for the standard of review for the determination of necessity should be the recognition of the relative strengths and weaknesses of international judicial bodies and national authorities’.¹⁷³ In terms reminiscent of WTO discourse, he suggested that:

the Tribunal should consider both the extent to which the measure contributes to the achievement of the objective sought and the degree to which the measure encroaches upon the protected rights of other States. The greater the contribution and the less the encroachment, the more likely the measure will be considered to be necessary.¹⁷⁴

His analysis endorsed full proportionality review as he accepted that in balancing the interests of the coastal state to enforce its laws in the EEZ, and other states’ legitimate rights and freedoms in the EEZ, ‘the relative importance of those interests to the respective State or States is an important factor’.¹⁷⁵ Accordingly, while Judge Paik did take account of the great importance to Guinea-Bissau of the interest of protecting the living resources in its EEZ, given it was a poor country highly dependent on fishery resources facing the problem of IUU fishing, he also included within his balancing exercise the importance to flag states of freedom of navigation within the EEZ.¹⁷⁶ One criticism of weighing the relative importance of the competing rights and interests in this

¹⁷¹ *M/V ‘Virginia G’* (n 163) Diss. Op. Sérvulo Correia [20]-[21].

¹⁷² *Ibid*, Sep. Op. Paik [9].

¹⁷³ *Ibid* [17]-[18].

¹⁷⁴ *Ibid* [25].

¹⁷⁵ *Ibid* [24].

¹⁷⁶ *Ibid* [32]-[34].

way, developed in Section E, is that it creates further room, beyond a least restrictive means test, for coastal state measures to be second-guessed.

D. The Contribution of UNCLOS Adjudicators to Broader Processes of Dispute Resolution

UNCLOS adjudicators have repeatedly performed a ‘predominantly facilitative’,¹⁷⁷ or ‘conflict management role’,¹⁷⁸ whereby they have clarified the relevant legal framework and ordered the parties to engage in further negotiation or cooperation. These developments are significant because they suggest that international adjudication can complement broader processes of dispute resolution. A prime example of this facilitative, conflict management role is ITLOS’ 2003 Provisional Measures Order in the *Land Reclamation Case*. In this case, Malaysia sought provisional measures regarding Singapore’s land reclamation activities in disputed territorial waters, specifically orders that Singapore suspend its activities, provide Malaysia with full information regarding its project, allow Malaysia to comment on the project’s impact, and negotiate with Malaysia regarding unresolved issues.¹⁷⁹ The Tribunal recalled the fundamental and enforceable nature of the duty to cooperate under the Convention and general international law,¹⁸⁰ before finding that: Singapore had not assessed the impact of its works on Malaysian waters,¹⁸¹ there had been insufficient cooperation between the parties prior to the initiation of proceedings,¹⁸² and it could not be excluded that ‘the land reclamation works may have adverse effects on the marine environment’.¹⁸³ Accordingly, ‘prudence and caution require[d] that Malaysia and Singapore establish mechanisms for exchanging information and assessing the risks or effects of land reclamation works and devising ways to deal with them’.¹⁸⁴ While the Tribunal did not order that the works be halted, it ordered that the parties establish an independent group of experts to conduct a study on the effects of

¹⁷⁷ See Klein (n 3) 83–4.

¹⁷⁸ Churchill (n 6) 411–12; Vaughan Lowe, ‘The “Complementary Role” of ITLOS in the Development of Ocean Law’ in Harry N Scheiber and Jin-Hyun Paik (eds), *Regions, Institutions, and Law of the Sea: Studies in Ocean Governance* (Martinus Nijhoff 2013) 30, 36. In addition to the cases discussed in this section, ITLOS’ Provisional Measures Order in the *SBT* case, discussed above n 108–113, has been read by some as an important example of adjudicators employing ‘a facilitative, problem-solving approach’: Douglas M Johnston, ‘Fishery Diplomacy and Science and the Judicial Function’ (2000) 10 Ybk IEL 33, 38–39.

¹⁷⁹ *Land Reclamation Case* (n 53) [23].

¹⁸⁰ Ibid [82]; Similarly: Joint Dec. Hossain and Oxman; Sep. Op. Lucky [12], [14]–[16].

¹⁸¹ *Land Reclamation Case* (n 53) [95].

¹⁸² Ibid [97].

¹⁸³ Ibid [96].

¹⁸⁴ Ibid [99].

the works and potential mitigation measures, and to regularly exchange information and assess the risks of Singapore's activities.¹⁸⁵ Undoubtedly, the Tribunal's Order must be understood in light of the assurances offered by Singapore during the hearing, including that Singapore agreed to the establishment of an independent scientific study on terms agreed by the parties.¹⁸⁶ Nevertheless, the case is a striking example of ITLOS performing a facilitative, conflict management role, with adjudicators clarifying the legal framework governing the parties' future interactions.¹⁸⁷

ITLOS also ordered the disputing parties to engage in further cooperation in its 2001 Provisional Measures Order in the wider *Mox Plant* dispute, discussed above. Before ITLOS, Ireland sought various provisional measures in relation to the nuclear plant authorised by the UK, including that the UK prevent the operation of the plant and any associated movements of radioactive waste within its territory.¹⁸⁸ The case was characterised by intense disagreement over scientific evidence, with the UK contending that Ireland had failed to provide proof to meet the requirements for provisional measures under Article 290(5),¹⁸⁹ and Ireland invoking the precautionary principle both to reverse the burden of proof and to inform the urgency requirement under Article 290(5).¹⁹⁰ Tellingly, after holding that Ireland had not met the urgency requirement, the Tribunal immediately noted that 'the duty to cooperate is a fundamental principle in the prevention of pollution of the marine environment under Part XII of the Convention and general international law and that rights arise therefrom which the Tribunal may consider appropriate to preserve under article 290 of the Convention'.¹⁹¹ Accordingly, relying on its power to prescribe different provisional measures to those requested, the Tribunal stated that 'prudence and caution require that Ireland and the United Kingdom cooperate in exchanging information concerning risks or effects of the operation of the MOX plant and in devising ways to deal with them'.¹⁹² The parties were ordered to consult to exchange further information on possible consequences of the plant for the Irish Sea,

¹⁸⁵ Ibid [106(1)(a)-(b)].

¹⁸⁶ See *ibid* [77]-[78], [84]-[88].

¹⁸⁷ Lowe (n 178) 30, 36.

¹⁸⁸ See *MOX (ITLOS)* (n 52) [29].

¹⁸⁹ See text above n 53.

¹⁹⁰ See *MOX (ITLOS)* (n 52) [71]-[75].

¹⁹¹ *Ibid* [82].

¹⁹² *Ibid* [83]-[84].

monitor resulting risks and devise measures to prevent pollution of the marine environment.¹⁹³

As Judge Treves highlighted, in effect ‘the Tribunal drew a distinction between the substantive right invoked by Ireland not be polluted ... and rights of a procedural character’.¹⁹⁴ The same distinction between substance and procedure is evident in the remarks of Judge Wolfrum, who rejected Ireland’s reliance on the precautionary principle, given that it would have required the Tribunal to evaluate in a summary way contested evidence regarding potential impacts of the Mox Plant on the Irish Sea, without being in a position to fully assess the prevailing situation. Nevertheless, he supported the alternative orders made by ITLOS, which were in keeping with the ‘overriding nature of the obligation to cooperate’.¹⁹⁵ My analysis of aspects of GATT Article XX chapeau jurisprudence in the last chapter suggests that the sharp distinction between substance and procedure introduced by these two judges should be approached cautiously. As was highlighted in the WTO context, while adjudicators can encourage regulating states to consider foreign interests, there is no avoiding difficult normative decisions regarding which interests deserve procedural rights and to what extent adjudication should promote multilateral solutions.¹⁹⁶

My claim that UNCLOS adjudicators have repeatedly played a facilitative, conflict management role whereby they have clarified the legal framework for the parties’ future interactions, is further supported by the *Chagos* Award, discussed above. Here, my focus is on the Tribunal’s finding that the UK had breached its obligations under the Convention to have due regard for Mauritius’ rights or to consult with Mauritius.¹⁹⁷ The Tribunal noted that:

the extent of the regard required by the Convention will depend upon the nature of the rights held by Mauritius, their importance, the extent of the anticipated impairment, the nature and importance of the activities contemplated by the United Kingdom, and the availability of alternative approaches. In the majority of

¹⁹³ Ibid [89(1)].

¹⁹⁴ Ibid, Sep. Op. Treves [7].

¹⁹⁵ Ibid, Sep. Op. Wolfrum.

¹⁹⁶ See Andrew Lang, *World Trade Law after Neoliberalism: Reimagining the Global Economic Order* (OUP 2011) 345–8.

¹⁹⁷ See *Chagos* (n 119) [520], [540].

cases, this assessment will necessarily involve at least some consultation with the rights-holding State.¹⁹⁸

Considering the manner in which the MPA had been proclaimed, and the significant effects on Mauritius' interests,¹⁹⁹ the Tribunal emphasised that UK had failed to properly consult with Mauritius, or balance its own rights and interests with those of Mauritius.²⁰⁰ The Tribunal, in an approach with strong similarities to the decisions of WTO adjudicators in cases such as *US-Shrimp*, *US-Gasoline*, and *EC-Seals*,²⁰¹ contrasted the consultative approach adopted by the UK towards the United States, another state with rights and interests in the area, which served as a 'yardstick' for measuring the regard owed to Mauritius.²⁰² While the Tribunal did not exclude that environmental considerations could potentially justify the infringement of Mauritius' fishing rights in the territorial sea, this would have required 'significant engagement with Mauritius to explain the need for the measure and to explore less restrictive alternatives'.²⁰³ The majority concluded by emphasising that it had:

taken no view on the substantive quality or nature of the MPA or on the importance of environmental protection. The Tribunal's concern has been with the manner in which the MPA was established, rather than its substance. It is now open to the Parties to enter into the negotiations that the Tribunal would have expected prior to the proclamation of the MPA, with a view to achieving a mutually satisfactory arrangement for protecting the marine environment ...²⁰⁴

Clearly the Award envisages adjudication, having clarified the legal framework applying to the parties' interactions, operating in a complementary manner with future negotiations between the parties.²⁰⁵

¹⁹⁸ Ibid [519].

¹⁹⁹ See ibid [521]-[522].

²⁰⁰ Ibid [534]-[535].

²⁰¹ Discussed above Ch III(D).

²⁰² *Chagos* (n 119) [528], [535].

²⁰³ Ibid [541].

²⁰⁴ Ibid [544].

²⁰⁵ It is unclear to what extent negotiations regarding marine environmental protection have occurred since the Award, although the broader dispute goes far beyond this issue and developments are ongoing. Recently the UK government announced that it would not allow the indigenous population to return to the Chagos Islands. Mauritius has indicated an intention to seek for the UN General Assembly to request an Advisory Opinion from the ICJ concerning the disputed question of sovereignty: Owen Boycott, 'Mauritius threatens to take Chagos Islands row to UN court' *Guardian* (18 November 2016) <<https://www.theguardian.com/world/2016/nov/17/mauritius-threatens-to-take-chagos-islands-row-to-un-court>>.

UNCLOS adjudicators have also performed a facilitative, conflict management role in disputes concerning potential marine environmental harm in the context of resource exploration activities in disputed maritime areas.²⁰⁶ For example, in its 2015 Provisional Measures Order in the *Ghana v Côte d'Ivoire* case a Special Chamber of ITLOS reiterated the Tribunal's previous statements regarding the obligation to cooperate to prevent harm to the marine environment,²⁰⁷ and ordered that the parties 'cooperate to that end'.²⁰⁸ The Chamber's role was very much one of managing the parties' conflict: Ghana was ordered not to pursue new oil drilling in the disputed area, to prevent confidential information being used to the detriment of Côte d'Ivoire, and to conduct continuous monitoring to prevent environmental harm.²⁰⁹ Yet the Chamber also refused Côte d'Ivoire's request that Ghana suspend ongoing exploration activities, reasoning that this would unduly burden Ghana, given the financial losses involved, and could endanger the marine environment.²¹⁰

Most recently in the *Philippines v China* case the Tribunal also placed some emphasis on the parties' duty to cooperate and understood its role as clarifying the legal framework applicable to the parties' relationship. Specifically, with regard to the environmental impact of China's island-building activities, the Tribunal found that China had failed to cooperate or coordinate with other states bordering the South China Sea or to communicate an EIA, given the risk of 'significant and harmful changes to the marine environment', as required by Article 206 of UNCLOS.²¹¹ Although the Philippines sought a prospectively focused declaration that China comply with its duties under UNCLOS, including those concerning protection and preservation of the marine environment, the Tribunal refused to make such an order, reasoning that it would not add anything to the Award which had already clarified the rights and obligations of the parties.²¹² For the Tribunal the purpose of dispute resolution was 'to clarify the Parties' respective rights and obligations and thereby to facilitate their future relations in accordance with the

²⁰⁶ UNCLOS imposes a duty to cooperate in such circumstances: see UNCLOS, Arts 74(3), 84(3); For a case where these obligations were interpreted, and both parties were held to have breached them see *Guyana/Suriname* (2007) 139 ILR 566, [459]-[486].

²⁰⁷ *Delimitation of the Maritime Boundary in the Atlantic Ocean (Ghana/Côte d'Ivoire)* (Provisional Measures, Order of 25 April 2015) ITLOS Reports 2015, 146, [73].

²⁰⁸ *Ibid* [108(1)(d)]. See also [108(1)(e)].

²⁰⁹ *Ibid* [108(1)(a)-(b)].

²¹⁰ *Ibid* [99]-[100].

²¹¹ *Philippines v China (Award)* (n 100) [984]-[991], [993].

²¹² *Ibid* [1182]-[1201].

general obligations of good faith that both governments unequivocally recognise’ and this had already been achieved.²¹³ The politically polarised setting of this dispute – with China not participating in the proceedings – and the fact that the Philippines did not ask the Tribunal for any specific orders regarding future cooperation between the parties, means that this example differs significantly from the more proactive, conflict management role performed by ITLOS in cases such as *Mox Plant* or *Land Reclamation*, discussed above. Furthermore, unlike in those cases where there was a possibility of improving environmental risk management through cooperation between the parties, in the *Philippines v China* case there was little scope for environmental remediation, with the Tribunal noting: ‘In practical terms, neither this decision nor any action that either Party may take in response can undo the permanent damage that has been done to the coral reef habitats of the South China Sea.’²¹⁴ Clearly, these wider contextual features of the dispute limit the potential for the Tribunal’s Award to productively complement a broader process of dispute resolution.²¹⁵

E. Conclusion

This chapter has analysed how the three problems focused on by this thesis arise within UNCLOS environmental adjudication and are responded to by adjudicators with various legal techniques. The adjudicatory practices reviewed are heavily influenced by the particular context and constraints within which UNCLOS adjudicators operate. Yet the practices analysed also provide a number of insights into wider problems facing international adjudicators, given the demands posed by contemporary conditions, and potential legal responses which are relevant beyond this setting.

As outlined above, adjudicators in this regime only enjoy compulsory jurisdiction over certain types of UNCLOS disputes, reflecting that in some areas, such as disputes concerning maritime boundaries or rights over living resources in the EEZ, states were unwilling to accept compulsory jurisdiction given the sensitivity of the interests at stake.

²¹³ Ibid [1198]-[1200].

²¹⁴ Ibid [1178].

²¹⁵ While there have recently been negotiations between the parties, which have resulted in China granting Philippines’ nationals access to fishing grounds around one of the features covered by the Award, China has maintained its position of refusing to acknowledge the Tribunal’s jurisdiction or negotiate on the basis of the Award: Jane Perlez, ‘Philippines’ Deal with China Pokes a Hole in U.S. Strategy’, *New York Times* (2 November 2016) <<http://www.nytimes.com/2016/11/03/world/asia/philippines-duterte-south-china-sea.html>>.

This consideration clearly informed the majority in the *Chagos MPA* arbitration, who held jurisdiction did not exist over those parts of Mauritius' claims that involved questions of land sovereignty. Similarly, in the *SBT Award* the majority of the Tribunal, in holding that jurisdiction was implicitly excluded by a regional fisheries agreement, placed heavy emphasis on the idea that UNCLOS does not establish a comprehensive system of compulsory jurisdiction. In contrast other UNCLOS adjudicators, such as Judge Keith in the *SBT Award*, Judges Wolfrum and Kateka dissenting in *Chagos*, and the Tribunal in the *Philippines v China* case, endorsed the 'substantive ... regime building conception' of UNCLOS, whereby the Convention, and its system of compulsory jurisdiction, are central to 'the public order of the oceans'.²¹⁶ Despite these different views regarding the centrality of compulsory adjudication to UNCLOS, it is clear that in some areas compulsory binding dispute resolution was selected in order to maintain and adapt parts of the bargain contained in the Convention over time. For example, judges and commentators widely recognised that the reason for including the prompt release mechanism was to maintain the delicate balance struck between flag state interests and the interests of coastal states within the newly established EEZ, given the potential for coastal states to abuse their enforcement powers. A meaningful analogy exists here with the idea seen in the WTO context, and endorsed by the Dispute Settlement Understanding and case law, that compulsory adjudication operates in that context to maintain and adapt the bargain contained in the covered agreements. Yet, as we saw, adjudication in the WTO context is concerned not only with maintaining the balance of legal rights and obligations within a major multilateral treaty, but also the balance of trade concessions exchanged by members upon entry.

At a relatively specific level it can be argued that the prompt release procedure is unique in international adjudication, in that it is a final rather than interlocutory proceeding, limited to the specific question of the reasonableness of the bond set by the coastal state pursuant to certain enforcement powers recognised by the Convention.²¹⁷ It would be wrong, however, to treat this mechanism as raising questions that are *sui generis*. Fundamentally what is at issue is an international discipline – the requirement to set reasonable bonds – which acts a check on the enforcement powers of coastal states within

²¹⁶ Oxman (n 10) 279.

²¹⁷ See text above n 55-61.

the EEZ and ensures that the interests of flag states, also protected by the Convention, are taken into account. The rationales cited by ITLOS judges as supporting deference – such as that coastal states have greater familiarity with relevant facts and considerations of local law, or that coastal states are pursuing legitimate regulatory goals endorsed by UNCLOS and other multilateral regimes – are standard reasons for deference. We will see similar arguments advanced in debates over the standard of review in the other adjudication contexts studied. The fact that under UNCLOS coastal states are exercising their ‘sovereign rights’ to conserve and manage living resources within the EEZ suggests that an additional degree of deference may be owed by adjudicators in this context.²¹⁸ While the ‘regulatory autonomy’ here is a particular type of regulatory autonomy – concerning coastal states’ sovereign rights to conserve and manage living resources within the EEZ – this debate should be considered alongside other contexts where international adjudicators review the exercise of regulatory powers by states which affect other protected interests, such as those of foreign investors or foreign producers.

The provisions of UNCLOS clearly inform the methods of review which have been applied to balance competing interests. The requirements in the Convention that bonds set by coastal states for prompt release be ‘reasonable’,²¹⁹ and that a coastal state may only take enforcement measures which are ‘necessary’ to secure compliance with its laws regarding living resources in the EEZ,²²⁰ clearly lays the ground for some form of balancing exercise. When combined with the design choice of compulsory jurisdiction such indeterminate standards have meant that courts and tribunals have played a prominent role in striking the precise balance between coastal state and flag state interests in disputes.²²¹ In case law concerning the reasonableness of bonds in the prompt release setting ITLOS judges have suggested that either full proportionality review or necessity testing might be used to mediate between the competing interests at stake, although the case law is not fully settled, and one criticism has been that the reasonableness test applied by the Tribunal needs to be further clarified.²²² The above analysis suggests that any further development of full proportionality review, where the relative importance of the

²¹⁸ See above n 169; UNCLOS, Arts 73(1), 56.

²¹⁹ UNCLOS, Art 73(2).

²²⁰ Ibid Art 73(1).

²²¹ Harrison (n 61) 218, 248; Erik Franckx, “‘Reasonable Bond’ in the Practice of the International Tribunal for the Law of the Sea” (2002) 32 Calif WILJ 303, 309.

²²² *Camouco* (n 56) Diss. Op. Wolfrum [3]; Dec. Laing; Harrison (n 61) 235.

competing rights is weighed, will problematically increase the room for coastal states' bonds to be second-guessed and determined not to be reasonable. In contrast, limiting the method of review to least restrictive means testing would help safeguard the regulatory aims pursued by coastal states, which is arguably appropriate given concerns that this aspect of ITLOS' jurisprudence has been overly intrusive and undermined coastal states' regulatory autonomy, in particular in combating IUU fishing.²²³ A related consideration which suggests that full proportionality review is inappropriate in this context is that the flag state frequently has limited connections to the private operators of the detained vessel, meaning in practice it would be the private interests of vessel owners and operators that would be weighed against the conservation interests of coastal states.²²⁴

The *M/V 'Virginia G'* case had a slightly different focus because it was not litigated through the prompt release procedure and thus not limited to the question of the reasonableness of a bond, with ITLOS adjudicating over whether the enforcement measures taken by the coastal state were 'necessary' under UNCLOS Article 73(1). Nevertheless, the case is instructive in highlighting the pitfalls of engaging in a strict form of necessity testing, which, as numerous dissenting judges highlighted, has the potential to undermine coastal states' regulatory space, in the context of the problem of IUU fishing, based on assessments of necessity that detached international adjudicators are not well placed to make.²²⁵ The practice seen in WTO adjudication of softening a necessity test, so that a measure may qualify as necessary more easily where the regulatory aim pursued is particularly important, can provide inspiration here. More generally, while the methods of review in this setting are clearly shaped by the language of the relevant provisions and the particular type of interests at stake, the balancing techniques utilised are of a wider relevance and exhibit significant similarities with those seen in the other contexts studied. The UNCLOS practices analysed are an often overlooked site of treaty-based adjudication where, as in other national and international adjudication settings, variants of proportionality analysis are emerging as the preferred technique for balancing competing, legally protected interests.

²²³ See eg Harrison (n 61) 248; Above n 158.

²²⁴ Chester Brown, "Reasonableness" in the Law of the Sea: The Prompt Release of the *Volga* (2003) 16 LJIL 621, 628–630; *Volga* (n 137) Diss. Op. Shearer [19] (suggesting that given changed circumstances since the conclusion of UNCLOS, including that illegal fishing typically involves sophisticated private operators with weak connections to the flag state, '[a] new "balance" has to be struck between vessel owners, operators and fishing companies on the one hand, and coastal States on the other').

²²⁵ See especially *M/V 'Virginia G'* (n 163) Diss. Op. Jesus [21]–[22].

The idea of a prospectively focused and facilitative form of adjudication has particular traction within the UNCLOS context because the Convention contains numerous provisions which in various formulations support an obligation to cooperate, including with regard to the protection and preservation of the marine environment.²²⁶ The fundamental nature of the obligation to cooperate under UNCLOS provided the basis for the proactive, conflict management role performed by ITLOS in cases such as *Land Reclamation*, *Mox Plant* and, more recently, *Ghana v Côte d'Ivoire*. The fact that these three examples were decisions ordering provisional measures is an important contextual influence. Within a provisional measures setting a facilitative and prospectively focused form of adjudicatory review is particularly appropriate given the aim is to preserve the parties' rights, pending the final resolution of the litigation. Relatedly, in provisional measures decisions, as compared to final judgments, it is more common for international tribunals to make mandatory orders.²²⁷ However, the suggestion that UNLOS adjudication might perform the role of clarifying the parties' legal obligations and facilitating their future interactions is not limited to a provisional measures context. As we saw in *Chagos*, the Tribunal, having determined that the UK had not sufficiently considered Mauritius' rights in declaring an MPA, emphasised that it had not taken a view on the substantive environmental protection issues involved and that it was open to the parties to negotiate on such matters after the Award. Similarly, the Tribunal in *Philippines v China* understood its role as clarifying the parties' obligations in order 'to facilitate their future relations'.²²⁸ Another reason why such developments should not be viewed as particular to the provisional measures context is that the grounds on which commentators have praised them, such as that adjudication may be most effective in terms of resolving disputes where adjudicators provide a framework that enables the parties to develop a cooperative solution,²²⁹ are the same essential arguments advanced in favour of a facilitative mode of adjudication in other regimes.

UNCLOS as a treaty is particularly open to being affected by subsequent changes in international law, given that it contains numerous terms of a generic nature, often refers to rules of general international law or international standards contained in other

²²⁶ See eg UNCLOS, Arts 74(3), 84(3), 197, 206.

²²⁷ Chester Brown, *A Common Law of International Adjudication* (OUP 2007) 210.

²²⁸ See above n 213.

²²⁹ See especially Lowe (n 178) 30–31, 34–36.

agreements, and relies on the conclusion of subsequent regional agreements and implementing agreements.²³⁰ The Convention's provision for various obligations to protect the marine environment framed in general terms means it is likely states' compliance with such UNCLOS norms will be informed by current environmental standards.²³¹ Many provisions of UNCLOS are also premised on factual matters that are prone to change, as was evident in the *2011 Seabed Advisory Opinion*. The fact that UNCLOS courts and tribunals are instructed, as matter of applicable law, to apply 'other rules of international law not incompatible with this Convention'²³² provides an explicit basis for drawing on newly emerged environmental norms. The relative openness of UNCLOS to subsequent developments in international law was evident in the precautionary approach developed by ITLOS in the *SBT* case, in the evolutionary interpretation of many of the relevant legal norms in the *2011 Advisory Opinion*, and in the use of widely-ratified environmental treaties to inform the meaning of UNCLOS provisions in the *Philippines v China* case. While *US-Shrimp*, considered in the last chapter, was an example of WTO adjudicators reading the GATT in light of new environmental norms, overall the role of such norms in WTO adjudication remains contested.²³³ In contrast, ITLOS and arbitral tribunals, drawing on a clear basis in UNCLOS, have consistently seen environmental protection as a key part of their mandate. In the next chapter we will see that the ICJ, faced with obligations to protect the environment framed in general terms, has, like UNCLOS tribunals, read aging treaty frameworks in light of new environmental norms. Yet, as will be shown, the ICJ's work must be understood in light of a variety of distinct contextual factors, including that it lacks any compulsory jurisdiction and adjudicates across highly varied legal contexts rather than having functions tied to a particular regime.

²³⁰ See generally Boyle, 'Further Development' (n 116) 41–55; Buga (n 116).

²³¹ See eg UNCLOS, Arts 192, 197, 206.

²³² UNCLOS, Art 293(1).

²³³ See above ch III, text at n 270-271.

V. INTERNATIONAL COURT OF JUSTICE LITIGATION

This chapter analyses the three selected problems facing international adjudicators in relation to the environmental case law of the International Court of Justice (ICJ). The ICJ has since the 1970s heard a substantial number of cases with an environmental component and such cases have been a regular feature of the Court's docket since the mid-1990s.¹ This chapter will develop a set of conclusions regarding how the practices reviewed are shaped by the particular contextual features of ICJ litigation. For example, the Court's general and consent-dependent jurisdiction, which means that it adjudicates across a wide range of different legal contexts and is particularly sensitive to consent-based concerns, will be shown to influence how the wider problems analysed register within the ICJ's case law. However, the ICJ is also adept at formulating parts of its legal reasoning in generalisable terms which are potentially transferable to other contexts. Furthermore, given the Court's immense semantic authority its contributions are frequently drawn upon in subsequent legal discourse, including by other international tribunals. Accordingly, analysing relevant ICJ practices constitutes an important step in the overall inquiry into how contemporary adjudicators might discharge their functions given the demands posed by the contemporary international legal order and the limitations of their roles.

This chapter proceeds as follows. Section A analyses several contextual features relevant to understanding this adjudication setting, in order to provide a stronger basis for the comparative analysis undertaken. Section B considers how the ICJ has responded to the problem of potential changes in international law, or changes in relevant facts, which affect the interpretation or application of relevant legal norms. We will see that the ICJ has repeatedly updated aging treaty frameworks in light of developments in international

¹ For discussion of various phases in the ICJ's environmental case law see Malgosia Fitzmaurice, 'The International Court of Justice and International Environmental Law' in Christian J Tams and James Sloan (eds), *The Development of International Law by the International Court of Justice* (OUP 2013); Jorge E Viñuales, 'The Contribution of the International Court of Justice to the Development of International Environmental Law: A Contemporary Assessment' (2008) 32 Fordham ILJ 232; In addition to the cases discussed below, there are a few cases which had a significant environmental component and were not decided on the merits, either because they were settled beforehand or the Court found there was no jurisdiction: *Certain Phosphate Lands in Nauru (Nauru v Australia)* (Preliminary Objections) [1992] ICJ Rep 240 (Nauru's claim partly concerned responsibility for the rehabilitation of land damaged by phosphate mining and after the Court upheld jurisdiction the case was settled by agreement: see [1993] 32 ILM 1474); *Fisheries Jurisdiction (Spain v Canada)* (Jurisdiction) [1998] ICJ Rep 432 (case concerned unilateral fisheries conservation measures taken by Canada and the Court held there was no jurisdiction); *Case concerning Aerial Herbicide Spraying (Ecuador v Colombia)* (Application, 31 March 2008) (case partly liability for damage to human health and the environment resulting from herbicide spraying and was settled by agreement, see the Court's Order of 13 September 2013, [2013] ICJ Rep 278); See recently *Dispute over the Status and Use of the Waters of the Silala (Chile v Bolivia)* (Application, 6 June 2016).

law, but concerns have also been raised about this practice potentially undermining legal certainty and party intent. Section C considers how the problems of the standard and method of review have arisen and been managed within the ICJ's environmental case law. Section D demonstrates that within the ICJ's environmental case law there are repeated examples of the Court adjudicating with a partly prospective focus, seeking to provide guidance to facilitate the parties' interactions after adjudication. Section E consolidates the key findings of the analysis undertaken.

A. Institutional Context for ICJ Litigation

1. The Lack of Compulsory Jurisdiction

A crucial difference in institutional context between the ICJ and the other adjudication contexts studied is that whereas WTO, UNCLOS, and investment adjudicators enjoy a degree of compulsory jurisdiction, albeit over a particular range of disputes, the ICJ has no compulsory jurisdiction.² While the ICJ is the 'principal judicial organ of the United Nations',³ and all members of the UN are automatically parties to its Statute,⁴ nothing in the Charter gives the Court any form of compulsory jurisdiction over member states,⁵ and its contentious jurisdiction always requires an additional act of consent by the disputing parties.⁶

There are essentially three ways in which the consent of the disputing states to the contentious jurisdiction of the Court can arise. First, the parties can agree after a dispute has arisen to submit it to the Court.⁷ While the parties will typically jointly submit a

² Christian Tomuschat, 'Article 36' in Andreas Zimmermann et al (eds), *The Statute of the International Court of Justice: A Commentary* (OUP 2012) [143]; Pieter Kooijmans, 'The ICJ in the 21st Century: Judicial Restraint, Judicial Activism, or Proactive Judicial Policy' (2007) 56 ICLQ 741, 743, 747 (ICJ 'handicapped by the principle of consent'); Strictly this observation applies to the Court's contentious jurisdiction: Robert Jennings and Rosalyn Higgins, 'General Introduction' in Zimmermann et al (eds), *Statute*, ibid [16]. Within its advisory jurisdiction, which this thesis does not focus on, the Court has generally rejected the argument that giving an advisory opinion regarding a dispute between states would undermine the principle of consent to jurisdiction, reasoning that the Court's opinion is not given to the disputing states but to the requesting organ, and is non-binding: *Interpretation of Peace Treaties* (Advisory Opinion) [1951] ICJ Rep 65, 71; See generally Robert Kolb, *The International Court of Justice* (Alan Perry tr, Hart Publishing 2013) 1069–1075.

³ UN Charter, Art 92.

⁴ Ibid Art 93(1).

⁵ This is despite Article 36(1) of the Court's Statute referring to 'matters specifically provided for in the Charter of the United Nations': Statute of the International Court of Justice (1945) 33 UNTS 993, Art 36(1) ('ICJ Statute').

⁶ Tomuschat (n 2) [19].

⁷ ICJ Statute, Art 36(1).

written agreement to the Court, there are no strict requirements as to form so long as the agreement of the parties is established.⁸ Accordingly, those rare situations where a state has unilaterally commenced litigation and the respondent state has subsequently agreed to submit to the Court's jurisdiction are properly characterised as a variant of this first situation, consent coming after the dispute has arisen.⁹ Second, treaties may contain a compromissory clause in which the treaty parties agree prospectively to submit a certain class of disputes – typically disputes concerning the interpretation and application of the agreement – to the ICJ.¹⁰ In practice many treaties do not confer jurisdiction on the ICJ and such clauses are only rarely being included in new treaties.¹¹ Third, states can 'at any time unilaterally declare that they recognise as compulsory ipso facto and without special agreement, in relation to any other State accepting the same obligation, the jurisdiction of the Court'.¹² Such declarations are typically made conditionally, subject to 'reservations' whereby states exclude certain types of disputes from their acceptance of compulsory jurisdiction.¹³ Currently, 72 states have made such declarations¹⁴ out of 193 UN member states, and since the Court's founding, 'the relative proportion of UN membership accepting compulsory jurisdiction has shrunk considerably'.¹⁵

In short, the Court's contentious jurisdiction is thoroughly consensual and follows 'the logic of *realpolitik*'.¹⁶ The lack of any form of compulsory jurisdiction has a few implications regarding how the Court's work differs from the other adjudication bodies considered. First, because it is often difficult to find a basis for ICJ jurisdiction, combined with the fact that the Court's jurisdiction is not subject-matter limited, its cases are far more varied than the other bodies considered in terms of the areas of law and legal instruments concerned.¹⁷ While in some areas the ICJ does hear repeated cases concerning

⁸ See Shabtai Rosenne, *The Law and Practice of the International Court 1920-2005*, vol 1 (4th ed, M Nijhoff Publishers 2006) 558-9; Tomuschat (n 2) 660-61.

⁹ Known as *forum prorogatum*. For outline of the three instances where this has arisen see Tomuschat (n 2) 661.

¹⁰ ICJ Statute, Art 36(1).

¹¹ Yuval Shany, *Assessing the Effectiveness of International Courts* (OUP 2014) 170; Gary Born, 'A New Generation of International Adjudication' (2012) 61 Duke LJ 775, 861-3; A full list of treaties with such a compromissory clause is available on the Court's website.

¹² ICJ Statute, Art 36(2).

¹³ ICJ Statute, Art 36(3); Jennings and Higgins (n 2) [16].

¹⁴ See the list on the Court's website: <<http://www.icj-cij.org/jurisdiction/index.php?p1=5&p2=1&p3=3>>.

¹⁵ See Shany (n 11) 170-171 (with relevant figures).

¹⁶ Tomuschat (n 2) 640, 647.

¹⁷ Rosenne (n 8) 30; Christian Djéffal, *Static and Evolutive Treaty Interpretation: A Functional Reconstruction* (CUP 2015) 215.

the same subject matter – for example maritime boundary delimitation – overall it does not have the same continuity, in terms of the legal setting in which it operates, as the other bodies studied. Second, because of its lack of compulsory jurisdiction, the ICJ faces, arguably more than the other bodies studied, the constant threat that states will not in future grant it jurisdiction over their disputes.¹⁸ This leads to a bias towards emphasising state consent, particularly on jurisdictional issues.¹⁹ Consent-based considerations feature in the other international adjudication contexts studied too, and those institutions are also sensitive to securing future disputes, however the ICJ’s jurisdictional situation means that this consideration becomes particularly pressing.

2. *The Goals of the ICJ*

The starting point for understanding the aims of the ICJ is Article 38(1) of the Court’s Statute, which states that the Court’s ‘function is to decide in accordance with international law such disputes as are submitted to it’.²⁰ The goal of settling disputes in accordance with international law is also supported by several provisions of the UN Charter,²¹ which are relevant to the aims of the ICJ because the Court’s Statute is an ‘integral part’ of the Charter and the Court the ‘principal judicial organ’ of the wider organization.²² The Court itself has stated that its function is to decide the issues in dispute between the parties in accordance with relevant rules of international law.²³ As we have seen in Chapter One, peaceful dispute settlement is a generic goal common to international courts.²⁴

Despite not being a goal reflected in the Court’s constituent documents,²⁵ there is little doubt that the Court by deciding cases also contributes to the clarification and development of international law, and the debate is really over the degree to which this

¹⁸ For recognition of this consideration see eg *Oil Platforms (Islamic Republic of Iran v United States of America)* (Judgment) [2003] ICJ Rep 161, Sep. Op. Buerghenthal [22].

¹⁹ Gleider Hernandez, *The International Court of Justice and the Judicial Function* (OUP 2014) 47–50 (on jurisdictional issues), 139–140, 288 (more generally); Armin von Bogdandy and Ingo Venzke, *In Whose Name? A Public Law Theory of International Adjudication* (OUP 2014) 41.

²⁰ ICJ Statute, Art 38(1).

²¹ UN Charter, Arts 1(1), 36(3); Shany (n 11) 165 (‘obtaining the conformity of judicial settlements with international law’ is an ICJ goal).

²² *Ibid* Art 92.

²³ See eg *LaGrand (Germany v United States of America)* (Judgment) [2001] ICJ Rep 466, [52]; *Nuclear Tests (New Zealand v France)* (Judgment) [1974] ICJ Rep 457, [58], [60]; *Northern Cameroons (Cameroon v UK)* (Preliminary Objections) [1963] ICJ Rep 15, 33–4.

²⁴ See above Ch I, text at n 44ff.

²⁵ Shany (n 11) 168.

occurs.²⁶ The Court itself has noted, as might be expected of a judicial body, that ‘it states the existing law and does not legislate. This is so even if, in stating and applying the law, the Court necessarily has to specify its scope and sometimes note its general trend.’²⁷ Amongst commentators it is possible to identify two broad views about the degree to which the Court has the purpose of contributing to the development of international law. One school of thought stresses that in contentious cases the Court is engaged in deciding the dispute presented to it, with its primary audience the parties to the case, and any development of the law being a secondary and incidental matter.²⁸ Another view, while accepting that the Court has the primary function of deciding the disputes presented to it,²⁹ foregrounds, to a greater degree, the Court’s secondary and important function of contributing, through its decisions, to the development of international law.³⁰

This thesis supports the latter view. Given the immense semantic authority which the Court enjoys and the degree to which its judgments are closely followed and deferred to,³¹ including by other international tribunals,³² the ICJ “cannot avoid contributing” to the wider international legal system by deciding cases.³³ As Gleider Hernandez highlights, a full account of the Court’s contribution in this area needs to include, beyond its development of particular norms, its significant influence in shaping the very terms of international legal discourse, and what counts as acceptable argumentation.³⁴ We will see below that although the ICJ typically adjudicates in a particular treaty context, it has often managed to couch part of its reasoning in more generalisable terms that can be drawn upon in subsequent legal discourse. Nevertheless, the Court is ultimately one actor in

²⁶ See especially Hersch Lauterpacht, *The Development of International Law by the International Court* (Revised ed, Stevens & Sons 1958) 3–5 (suggesting while the Court had not made a significant contribution to maintaining international peace it had ‘made a tangible contribution to the development and clarification’ of international law); Shany (n 11) 185.

²⁷ *Legality of the Threat or Use of Nuclear Weapons* [18].

²⁸ Iain Scobbie, “‘All Right, Mr. DeMille, I’m Ready for My Close-up’: Some Critical Reflections on Professor Cassese’s “The International Court of Justice: It is High Time to Restyle the Respected Old Lady”” (2012) 23 EJIL 1071, 1087 (ICJ ‘principally a transactional court’); Stephan Wittich, ‘The Judicial Functions of the International Court of Justice’ in Isabelle Buffard et al (eds), *International Law between Universalism and Fragmentation: Festschrift in Honour of Gerhard Hafner* (Martinus Nijhoff Publishers 2008) 996; RY Jennings, ‘The Judicial Function and the Rule of Law in International Relations’, *Collected Writings of Sir Robert Jennings*, vol 1 (Kluwer Law International 1998) 483–4.

²⁹ Lauterpacht (n 26) 70.

³⁰ *Ibid* 42–3.

³¹ Hernandez (n 19) 5; DP O’Connell, *International Law*, vol 1 (2nd edn, Stevens & Sons 1970) 32 (ICJ judgments are ‘accorded ... a truly astonishing deference’).

³² See eg Alain Pellet, ‘The Case Law of the ICJ in Investment Arbitration’ (2013) 28 ICSID Review 223.

³³ Shany (n 11) 168 (quoting an anonymous interview with an ICJ judge).

³⁴ Hernandez (n 19) 88–93.

wider processes of law-development. Its influence varies across issues areas, and depends on multiple factors, many of which are beyond its control, such as how often cases in an issue-area arise, whether competing law-developing agencies operate with the area, and whether the area of law is already codified.³⁵

It is important to note that the ICJ does not have a ‘regime support’ function in the same sense as the other tribunals considered, as it is not created by, and embedded within, a particular functional regime. However, the ICJ does, in other weaker senses sometimes play a ‘regime support’ function. At a relatively specific level the Court may have a particular role within the treaty or legal regime applicable to a dispute. For example, we will see below that in the *Whaling* case, where the dispute was primarily governed by the International Convention for the Regulation of Whaling (Whaling Convention),³⁶ there was significant debate over the Court’s role within the wider regime created by the Convention.³⁷ Furthermore, given the Court’s status as ‘principal judicial organ’ of the UN and its general jurisdiction some see it as supporting and legitimating the wider normative regime of international law.³⁸ We will see below that in the context of greater specialisation of different branches of international law the ICJ has played an informal role in providing guidance on general concepts of international law and ‘mainstreaming’ specialised regimes into the wider body of general international law.³⁹ Nevertheless, while the ICJ can be said to have ‘regime support’ roles in these senses, it is important to emphasise the distinction, in terms of institutional context, with the adjudicatory bodies studied in other chapters, which are all created for the purposes of hearing disputes in regimes with particular goals.

³⁵ Christian J Tams, ‘The ICJ as a “Law-Formative Agency”: Summary and Synthesis’ in Tams and Sloan (eds), *Development* (n1) 668–675.

³⁶ (1946) 161 UNTS 74.

³⁷ *Whaling in the Antarctic (Australia v Japan, New Zealand intervening)* (Judgment) [2014] ICJ Rep 226.

³⁸ Shany (n 11) 185–6; Within its advisory jurisdiction, which this thesis does not focus on, the Court clearly has a role within the wider UN organisation, although it is not a central one: Shany, *ibid* 166.

³⁹ See eg Mads Andenas, ‘Reassertion and Transformation: From Fragmentation to Convergence in International Law’ (2015) 46 *Georgetown JIL* 685; Andrew Lang, ‘The Role of the International Court of Justice in a Context of Fragmentation’ (2013) 62 *ICLQ* 777; Tams (n 35) 657–8; Fitzmaurice (n 1); Viñuales (n 1).

3. *The Judges in ICJ Litigation*

The ICJ consists of 15 members, each of a different nationality.⁴⁰ Judges who hold the nationality of one of the parties are permitted to participate,⁴¹ and where the Court does not include a national of one or both of the parties, the non-represented party or parties can nominate a judge ad hoc.⁴² Members of the Court are elected by separate votes of the UN General Assembly and Security Council,⁴³ from a list of nominations created by national groups in the Permanent Court of Arbitration.⁴⁴ Members are required to be persons of high moral character, and possess the qualifications required for appointment to the highest judicial offices in their countries, or be ‘juristconsults of recognized competence in international law’.⁴⁵ In addition to such qualifications, electors are to bear in mind that the Court as a whole includes ‘representation of the main forms of civilization and of the principal legal systems of the world’.⁴⁶ In practice, a seat is reserved for each of the five permanent members of the Security Council.⁴⁷ Furthermore, within the electing institutions, a practice exists whereby the seats on the Court are divided up according to the regional groupings which operate in the UN.⁴⁸ Judges are elected for terms of nine years, and can be re-elected.⁴⁹ As might be expected, the appointment process is highly political and such politics includes decisions on the re-election of sitting ICJ judges.⁵⁰ The Court has tended to be composed of former diplomats and politicians with a legal background, former legal advisers to foreign ministries, practitioners from the international bar, and, to a lesser degree, international law academics or national judges.⁵¹ Thus the Court’s bench is, on the whole, sensitive to states’ interests and, in particular, sovereignty-based concerns.⁵² The Court drafts its judgments through a multi-stage,

⁴⁰ ICJ Statute, Art 3(1)

⁴¹ ICJ Statute, Art 31(1).

⁴² See ICJ Statute, Arts 31(2)-(6).

⁴³ See ICJ Statute, Arts 8, 10, 11, 12.

⁴⁴ ICJ Statute, Art 4(1). A national group in the PCA is constituted by persons nominated by each member state of the PCA; See also ICJ statute, Art 4(2); Rosenne (n 8) 364–9.

⁴⁵ ICJ Statute, Art 2.

⁴⁶ ICJ Statute, Art 9.

⁴⁷ Shany (n 11) 172 fn 63.

⁴⁸ Ibid 172; Rosenne (n 8) 382-3.

⁴⁹ ICJ Statute, Art 13(1).

⁵⁰ See Shany (n 11) 172 (with further references).

⁵¹ Robert Kolb, *The Elgar Companion to the International Court of Justice* (Edward Elgar Publishing 2014) 108–9. See also ch 7; For the biographies of current members see the Court’s website: <<http://www.icj-cij.org>>.

⁵² Shany (n 11) 173; Hernandez (n 19) 288.

highly collective process,⁵³ and judges have a right to give an individual opinion whether or not they dissent,⁵⁴ which is heavily used,⁵⁵ and leads to a diversity of views. While the collective judgment of the Court carries greater weight, individual opinions are important for fully appreciating the choices the Court has made.⁵⁶

B. Balancing Stability and Change in the ICJ's Environmental Case Law

This section analyses how the ICJ has experienced and responded to the challenge of balancing the competing interests of stability and change when interpreting and applying relevant treaty norms. As explained in Chapter One, this is a pressing problem facing international adjudicators because while treaty-making has stagnated in many areas a large number of disputes continue to be litigated, meaning demands for change are often directed at adjudicators.⁵⁷ The ICJ has frequently been faced with this challenge because it often adjudicates over dated treaties given its general and consent-based jurisdiction. Accordingly, the Court's case law is an important resource for understanding the role of international adjudication in incrementally adapting international law to new demands.

1. Managing Changes in International Legal Norms

The challenge of balancing the competing demands of providing for legal certainty through interpretation and allowing relevant legal norms to evolve, given developments in international law, was a key issue in the *Whaling* case. This case involved a dispute concerning whether whaling permits granted by Japan were covered by the exception in Article VIII of the Whaling Convention, which enables whaling 'for purposes of scientific research'.⁵⁸ Australia, and New Zealand intervening, argued that the treaty provision only authorised the granting of special permits to kill whales where non-lethal methods were not available, and supported this view by relying on various resolutions and guidelines adopted by the International Whaling Commission (IWC), arguing these constituted subsequent agreement between the treaty parties, or subsequent practice.⁵⁹ The Court

⁵³ This is governed by the Resolution Concerning the Internal Judicial Practice of the Court (1976); See generally Hernandez (n 19) 104–6.

⁵⁴ ICJ Statute, Art 57; ICJ Rules of Court (1978), Art 95(2).

⁵⁵ Rainer Hofmann and Tilmann Laubner, 'Article 57' in Zimmermann et al (eds), *Statute* (n 2) (Noting the Court's first 282 decisions produced 1,192 individual opinions).

⁵⁶ Hernandez (n 19) 96–7, 112–113.

⁵⁷ See above Ch I, n 78–79 and text.

⁵⁸ Whaling Convention, Art VIII.

⁵⁹ *Whaling* (n 37) [78]–[79], [81].

found that ‘Australia and New Zealand overstate the legal significance of the recommendatory resolutions and Guidelines on which they rely’, including because many of the resolutions had not been adopted with the support of all parties to the Convention, and in particular Japan, and thus could not constitute subsequent agreement or practice.⁶⁰ This finding operates to ensure treaty stability and legal certainty by affirming that subsequent agreement and subsequent practice require the consent, either explicit or implicit, of the treaty parties.⁶¹ Nevertheless, the Court permitted a degree of evolution in the relevant treaty regime by finding that the treaty parties had an obligation to cooperate with the IWC and its Scientific Committee and ‘thus should give due regard’ to these bodies’ non-binding recommendations.⁶² This obligation was then emphasised in the Court’s subsequent reasoning as to why Japan’s program, given its lack of consideration of the feasibility of non-lethal methods, was not covered by the treaty exception.⁶³

The suggestion that these interpretive questions involved managing a tension between providing for legal certainty and allowing the relevant legal framework to evolve, given developments in international law, is strongly supported by the views expressed by individual judges. Several judges suggested that the Court had, through its consideration of the obligation to give due regard to IWC resolutions, impermissibly allowed the Convention regime to evolve and undermined legal certainty for the parties to the Convention. Judge Abraham noted that the obligation to ‘give due regard’ to IWC

⁶⁰ Ibid [83].

⁶¹ On the restricted and consensual nature of subsequent practice see Laurence Boisson de Chazournes, ‘Subsequent Practice, Practices, and “Family-Resemblance”: Towards Embedding Subsequent Practice in its Operative Milieu’ in Georg Nolte (ed), *Treaties and Subsequent Practice* (OUP 2013) 53-56; For another example of the Court finding that subsequent practice and subsequent agreement were not established because the treaty parties’ mutual agreement was lacking see *Kasikili/Sedudu Island (Botswana/Namibia)* (Judgment) [1999] ICJ Rep 1045, [52]-[79].

⁶² *Whaling* (n 37) [83]; See also Sep. Op. Charlesworth [4], [13] (emphasising IWC resolutions adopted with negative votes, although not constituting subsequent agreement or practice, were relevant to the duty to cooperate ‘[p]articularly when they are adopted by a large majority of IWC members’).

⁶³ See *Whaling* (n 37) [137], [144]; Hamamoto suggests that the obligation to give due regard to IWC recommendations only applied to those resolutions adopted by consensus, noting that the requirement to consider the feasibility of non-lethal methods, emphasised in the Court’s later scrutiny of Japan’s program, was contained in resolutions adopted by consensus. In contrast a resolution which was not adopted by consensus, and which only permitted lethal methods where non-lethal alternatives were not available, was noted by the Court in considering the subsequent practice issue (Judgment, [78]) but was not endorsed in its analysis of the availability of non-lethal alternatives (Judgment, [137]): Shotaro Hamamoto, ‘From the Requirement of Reasonableness to a “Comply and Explain” Rule: The Standard of Review in the Whaling Judgment’ in Malgosia Fitzmaurice and Dai Tamada (eds), *Whaling in the Antarctic: Significance and Implications of the ICJ Judgment* (Brill Nijhoff 2016) 43-44; While this is a plausible reading of the Judgment, it is problematic to suggest that those resolutions adopted by a large majority have no relevance. Contrast the approach of Judge ad hoc Charlesworth, *ibid*.

recommendations could not have the effect ‘of transforming those recommendations into binding decisions’.⁶⁴ Similarly, Judge Greenwood emphasised that because the Convention already contained a process enabling the IWC to adopt binding amendments to its Schedule,⁶⁵ there was ‘less of a case for treating [non-binding] recommendations as having significant effects on the basis of an evolutionary interpretation’, which could allow changes lacking sufficient support for a formal amendment ‘to be introduced through the back door’.⁶⁶ Judge Owada also criticised Australia and New Zealand’s argument that the Whaling Convention had evolved towards greater emphasis on conservation as ‘tantamount to an attempt to change the rules of the game as provided for in the Convention’,⁶⁷ stressing that the Convention was ‘not malleable ... according to changes in the surrounding socio-economic environments’.⁶⁸ The concern for ensuring legal certainty through interpretation animates all of these remarks.

In contrast several other judges emphasised that the regime established by the Convention had evolved in the direction of conservation and this narrowed the scope of the exception for scientific whaling. For example, Judge Xue noted that while the treaty exception concerning scientific whaling formally remained intact, a number of developments within the Convention regime meant that the regime had evolved in the direction of conservation and thus it was ‘hard to claim that’ the scope of the exception ‘stays the same as before’.⁶⁹ Similarly, Judge Yusuf heavily favoured evolution in the relevant treaty, holding that developments within the Convention regime, in particular the moratorium on commercial whaling, meant the balance within the Convention had ‘clearly shifted ... in favour of more conservation and less exploitation’.⁷⁰ He suggested that given these developments, and developments in wider international environmental law, the Court should have asked whether Japan’s conduct frustrated the object and purpose of the Convention.⁷¹ Plainly, this view allows greater evolution in the relevant legal framework, given developments in international law, but could be accused of undermining legal certainty by allowing the object and purpose of a treaty to shift without the agreement of all treaty parties.

⁶⁴ Ibid, Diss. Op. Abraham [38] (translation by registry).

⁶⁵ Regarding the institutional framework created by the Convention see *Whaling* (n 37) [45]-[47].

⁶⁶ Ibid, Sep. Op. Greenwood [7].

⁶⁷ Ibid, Diss. Op. Owada [16].

⁶⁸ Ibid [12].

⁶⁹ Ibid, Sep. Op. Xue [12].

⁷⁰ Ibid, Diss. Op. Yusuf [26].

⁷¹ Ibid [25]-[26].

Both parties had in their arguments addressed the relevance of broader international environmental law for interpreting the treaty exception.⁷² Other relevant international law, including the precautionary principle, is notable for its complete absence from the majority judgment.⁷³ This may reflect that the Court was conscious of the role of the IWC as a body empowered to update the Convention over time. However, there is a stark contrast with the opinions of some individual judges who would have allowed far greater evolution of the treaty exception in light of other relevant international law which had subsequently emerged. For example, Judge ad hoc Charlesworth held that ‘treaties dealing with the environment should be interpreted wherever possible in light of the precautionary approach, regardless of the date of their adoption’.⁷⁴ This required, in terms of interpreting the scope of the exception for scientific whaling, that lethal methods ‘be indispensable to the purposes of scientific research’, and non-lethal methods ‘be used wherever possible’.⁷⁵ Similarly, Judge Trindade held that the Whaling Convention had to be interpreted in the context of other international instruments relevant to the conservation and management of marine mammals which followed ‘a conservation-oriented approach and the precautionary principle’, and this warranted a narrow interpretation of the scientific whaling exception.⁷⁶ These interpretations favour legal change by narrowing the exception in the Whaling Convention, in light of the emergence of the precautionary principle, to a greater degree than the majority judgment. While these approaches could be argued to undermine legal certainty, by enabling the meaning of the treaty exception to shift without the agreement of all parties to the Convention, there is a strong argument that agreement amongst all treaty parties is an inappropriate threshold, because it effectively gives each party to a major multilateral treaty a veto over its evolution.⁷⁷

In the *Pulp Mills* case, which concerned Uruguay’s authorisation of the construction of two pulp mills on the River Uruguay and their environmental effects, the Court was also squarely faced with the question of how other relevant international law affected the

⁷² For Japan’s arguments regarding other international environmental law see CR 2013/13, [23]-[53] (Boyle); For Australia’s position see CR 2013/7, [48]-[58] (Boisson de Chazournes)

⁷³ Similarly: Jeffrey J Smith, ‘Evolving to Conservation?: The International Court’s Decision in the Australia/Japan Whaling Case’ (2014) 45 ODIL 301, 318.

⁷⁴ *Whaling* (n 37) Sep. Op. Charlesworth [9].

⁷⁵ *Ibid* [10].

⁷⁶ *Ibid*, Sep. Op. Cançado Trindade [57]-[59].

⁷⁷ Margaret A Young, ‘Regime Interaction in Creating, Implementing and Enforcing International Law’ in Margaret A Young (ed), *Regime Interaction in International Law: Facing Fragmentation* (CUP 2012) 95–6.

parties' obligations under the 1975 Statute of the River Uruguay. Argentina claimed that the 1975 Statute had to be interpreted in light of other relevant rules of international law, particularly those concerning watercourses and the environment, to ensure its interpretation continued to evolve with changes in environmental standards.⁷⁸ Argentina further argued that certain provisions of the 1975 Statute had the effect of incorporating into the Statute the parties' obligations under other multilateral environmental treaties, many of which post-dated the Statute, and the Court could adjudicate on compliance with those treaties also.⁷⁹ The Court's rejection of the latter argument is unsurprising and operates to protect legal certainty: the relevant provisions of the Statute did not, on their face, actually incorporate the other international obligations,⁸⁰ and the consent to jurisdiction was limited to disputes concerning the interpretation and application of the Statute.⁸¹

Nevertheless, the Court responded in other ways to the need for the obligations under the Statute to evolve with changes in environmental standards. For example, the Court accepted that 'a precautionary approach may be relevant in the interpretation and application of the provisions of the Statute'.⁸² Furthermore, the Court interpreted the parties' obligation under the Statute to protect and preserve the aquatic environment in light of the obligation to undertake an environmental impact assessment where proposed activities pose a significant risk of transboundary harm, which it clarified, could 'now be considered a requirement under general international law'.⁸³ What the Court has done through these steps is to balance the interest of legal certainty – specifically by not asserting jurisdiction over other treaties where it was not clearly given – with the interest of allowing the Statute to evolve, by reading its provisions in light of developments in international law. Again, what we see is that given the relatively under-developed processes for law-adjustment on the international plane, international adjudicators often face acute questions of how to interpret relevant legal norms in a manner that takes account of developments in wider international law without unduly undermining legal certainty.

⁷⁸ *Pulp Mills on the River Uruguay (Argentina v Uruguay)* (Judgment) [2010] ICJ Rep 14, [55].

⁷⁹ *Ibid* [53], [56].

⁸⁰ Rather they created an independent obligation for the parties to take environmental measures in accordance with such agreements: *ibid* [61]-[62].

⁸¹ *Ibid* [48].

⁸² *Ibid* [164].

⁸³ *Ibid* [204].

Gabčíkovo-Nagymaros is another striking example of the Court managing the challenge of taking account of subsequent developments in international law in interpreting an aging treaty while nevertheless ensuring a sufficient degree of legal certainty. Here, one of Hungary's arguments as to why its termination of a 1977 treaty for the joint construction of a hydroelectric project was lawful was that subsequent developments in international environmental law precluded the performance of the treaty.⁸⁴ In response, drawing on treaty wording that was open to such an interpretation, the Court emphasised that the relevant treaty provisions permitted, and indeed required, the parties to take new environmental norms into account in their application of the treaty.⁸⁵ Importantly, this interpretation allowed the Court to favour treaty stability by rejecting Hungary's various arguments that the relevant instrument had been terminated,⁸⁶ without appearing backwards in terms of the environmental standards applied.⁸⁷

My argument that the Court was, through this approach, navigating a delicate balance between allowing the relevant legal norms to evolve, given developments in international law, and ensuring legal certainty for the treaty parties, is supported by certain individual opinions rendered. For example, Judge Bedjaoui attempted to limit the consequences of the evolutionary interpretation undertaken by the Court, emphasising that in general treaties are to be interpreted consistent with the parties' intention at the time of conclusion,⁸⁸ and a state in no way '*incurs evolutionary and indeterminate duties*'.⁸⁹ For him, 'there is good reason to protect the autonomy of the will', and thus, barring a basis in specific treaty language, such as the use of vague terms whose meaning is based on the general law, an evolutionary interpretive approach is not appropriate.⁹⁰ The contrast with Judge Weeramantry's approach is stark: for him the issue was not one of respecting consent and treaty stability, but rather consistency with the present normative order. Since environmental treaties affect human rights they 'cannot be applied in such a manner as to

⁸⁴ This was one of five arguments advanced by Hungary to support the lawfulness of its termination: *Gabčíkovo-Nagymaros (Hungary/Slovakia)* (Judgment) [1997] ICJ Rep 7, [92]-[97].

⁸⁵ Ibid [112], [140]. The relevant treaty provisions are extracted at [18].

⁸⁶ Ibid [103], generally [92]-[115]; Fitzmaurice (n 1) 633 (decision ultimately prioritises treaty stability and state responsibility over environmental concerns).

⁸⁷ *Gabčíkovo-Nagymaros* (n 91) Sep. Op. Bedjaoui [18] ('This is the first major case brought before the Court in which there is such a sensitive ecological background that it has moved to centre stage, threatening to divert attention from treaty law. International public opinion would not have understood had the Court disregarded the new law, whose application was called for by Hungary.' Translation by registry).

⁸⁸ Ibid [14].

⁸⁹ Ibid.

⁹⁰ Ibid [17]-[18].

constitute a denial of human rights as understood at the time of their application', even if such standards have evolved since the treaty's conclusion.⁹¹ In short, Judge Bedjaoui's interpretation achieves a reconciliation that heavily favours certainty for the treaty parties, whereas Judge Weeramantry places paramount importance on the interest of consistency of treaty obligations with the contemporary normative order. The two interpretations reflect fundamentally different views regarding the roles of adjudicators in gradually updating treaty obligations.

The adjudicatory technique of allowing the applicable law to evolve by construing a treaty term as having an evolutionary meaning, and thus permitting change, while nevertheless claiming to respect the treaty parties' intent, and thereby affirming treaty stability, was on full display in the Court's 2009 judgment in the *Dispute regarding Navigational and Related Rights*.⁹² In this case, the parties were in dispute as to their respective rights under a dated bilateral river treaty, including regarding the scope of Costa Rica's right of free navigation under the treaty, which was subject to Nicaragua's right to regulate for environmental and other purposes. In justifying an evolutive interpretation of the term 'commerce', so as to allow Costa Rica's right of free navigation to cover new activities, such as the transport of persons for profit, the Court spent significant time explaining why its approach gave effect to, and thus implicitly did not override, original party intent. After first acknowledging that there are situations where respecting the parties' common intention will require that a term be given its original meaning,⁹³ the Court stated:

On the other hand, there are situations in which the parties' intent upon conclusion of the treaty was, or may be presumed to have been, to give the terms used ... a meaning or content capable of evolving, not one fixed once and for all, so as to make allowance for, among other things, developments in international law. In such instances it is indeed in order to respect the parties' common intention at the time the treaty was concluded, not to depart from it, that account should be taken of the meaning acquired by the terms in question upon each occasion on which the treaty is to be applied.⁹⁴

⁹¹ Ibid, Sep. Op. Weeramantry 114-5.

⁹² *Dispute regarding Navigational and Related Rights (Costa Rica v Nicaragua)* (Judgment) [2009] ICJ Rep 213.

⁹³ Ibid [63].

⁹⁴ Ibid [64].

Here the question facing the Court was squarely one of change, namely that the commercial transport of passengers on the river had become more common since the treaty was concluded.⁹⁵ The Court reconciles the apparent change its interpretation permits with the need to provide for legal certainty by suggesting that its solution respects the treaty parties' original intent, in particular given 'commerce' was 'a generic term referring to a class of activity', and the treaty was entered into 'for an unlimited duration'.⁹⁶ In contrast, several individual judges accused the Court of failing to respect the treaty parties' intent, and thus, implicitly, of undermining legal certainty through its interpretation.⁹⁷

2. *Managing Changes in Relevant Facts*

The ICJ has repeatedly faced the problem of dealing with changes in relevant facts which affect the application of relevant legal norms. An excellent example is the 1999 judgment in the *Case concerning Kasikili/Sedudu Island*, where the Court was charged with determining a boundary, partly on the basis of a 19th century treaty which referred to the 'main channel' of the River Chobe, without defining this term.⁹⁸ As Judge Weeramantry noted, the case had an environmental component because the area concerned was of ecological importance, and the Court could have regard to the need to preserve this resource in undertaking its task.⁹⁹ Importantly for present purposes, the Court held that it could take into account contemporary scientific knowledge in order to give meaning to the treaty term agreed in 1890.¹⁰⁰ The tension between taking into account the contemporary scientific knowledge, while ensuring a degree of continuity in the legal concept being applied, was highlighted by Judge Higgins. She emphasised that the Court was applying 'a somewhat general term, decided upon by the parties in 1890 to a geographic and hydrographic situation much better understood today', which was distinguishable from the idea of a generic legal term that would itself evolve over time.¹⁰¹ She stressed that:

⁹⁵ Ibid [58].

⁹⁶ Ibid [66]-[70]; Commentators have also suggested that the intention of the treaty parties or their "time-will" is the key to determining whether an evolutive interpretation is justified: see eg Panos Merkouris, '(Inter)Temporal Considerations in the Interpretative Process of the VCLT: Do Treaties Endure, Perdure or Exdure?' (2014) 45 NYBIL 121, 143-44.

⁹⁷ *Navigational Rights* (n 92) Sep. Op. Skotnikov [4]-[7]; Dec. Guillaume [15].

⁹⁸ *Kasikili/Sedudu* (n 61) [17]-[27].

⁹⁹ Ibid, Diss. Op. Weeramantry [103]-[119].

¹⁰⁰ *Kasikili/Sedudu* (n 61) [20].

¹⁰¹ Ibid, Dec. Higgins [1]-[3].

we must never lose sight of the fact that we are seeking to give flesh to the intention of the parties, expressed in generalized terms in 1890. We must trace a thread back to this point of departure. ... our task is to decide what general idea the parties had in mind, and then make reality of that general idea through the use of contemporary knowledge.¹⁰²

In contrast, Judge Weeramantry suggested that given the age of the treaty, ‘modern scientific criteria are not the indicia appropriate for determining what was commonly understood to be the main channel’, the parties having had, in 1890, a non-technical understanding of this term.¹⁰³ The underlying question which the judges were grappling with is one seen in all of the adjudication settings studied, namely how changes in relevant factual knowledge affect the application of a legal norm, despite the content of the norm remaining constant. Clearly the relevant treaty term, referring to the ‘main channel’, was somewhat open to being affected by subsequent developments in technical knowledge. In many of the environmental cases studied, in taking account of changing factual circumstances, there will not be the same difficulty in tracing a thread back to the treaty parties’ original intent. For example, when contemporary treaty drafters include in agreements terms such as ‘due diligence’ or ‘best available technology’ they no doubt recognise that the application of such terms will depend upon the state of relevant facts, such as scientific knowledge or technical capacity, at the time when the term is applied.

A final example which raised both the question of change in relevant legal norms and change in relevant facts was the unique situation faced by the Court in 1995 in determining New Zealand’s *Request for an Examination of the Situation*,¹⁰⁴ pursuant to a paragraph of the Court’s 1974 *Nuclear Tests* judgment,¹⁰⁵ which concerned the legality of French atmospheric nuclear testing in the South Pacific, given, among other reasons, its environmental effects.¹⁰⁶ The context here was that the 1974 judgment found New Zealand’s case against France without object in light of unilateral declarations by France that it would cease atmospheric nuclear testing and move to underground testing.¹⁰⁷

¹⁰² Ibid [4].

¹⁰³ Ibid, Diss. Op. Weeramantry [67]-[69].

¹⁰⁴ *Request for an Examination of the Situation in Accordance with Paragraph 63 of the Court’s Judgment of 20 December 1974 in the Nuclear Tests (New Zealand v France) Case* (Order) [1995] ICJ Rep 288.

¹⁰⁵ *Nuclear Tests* (n 23) [63].

¹⁰⁶ See New Zealand’s application instituting proceedings: *Nuclear Tests (New Zealand v France)* ICJ Pleadings, vol II, 8, [28].

¹⁰⁷ *Nuclear Tests* (n 23) [45]-[62], [65].

However, it further provided ‘that if the basis of this Judgment were to be affected, the Applicant could request an examination of the situation in accordance with the provisions of the Statute’, in a context where France had subsequently removed the jurisdictional consent enabling the proceedings,¹⁰⁸ meaning no new case could be instituted. Importantly, New Zealand’s argument in 1995, in seeking to rely on this provision, was that the ‘basis of the Judgment’ had been ‘affected’ in light of subsequent developments in fact and law. New Zealand argued that by 1995 knowledge regarding the risks of underground nuclear testing had evolved and the assumption made in the 1974 judgment that underground testing was safe was erroneous, meaning ‘the basis of the Judgment had been affected by virtue of changes in the factual situation’.¹⁰⁹ New Zealand sought to support its case through scientific evidence which had emerged in the period between 1974 and 1995.¹¹⁰ New Zealand also argued that developments in international environmental law since 1974 had affected the basis of the Judgment.¹¹¹

In finding that the basis of the 1974 judgment concerned atmospheric nuclear testing, and accordingly had not been affected, the Court held that it could not take into account New Zealand’s arguments concerning the consequences of French underground nuclear testing since 1974, nor developments since then in international law.¹¹² In contrast, several dissenting judgments, which found that the basis of the 1974 judgment had been affected, developed an approach under which the Court’s task was much less backwards looking and static, albeit at the risk of being seen to assert jurisdiction where the 1974 judgment provided no basis for it. For example, Judge ad hoc Palmer suggested that in the majority approach: ‘The law appears as some disembodied construct that is far removed from the concerns of the real world. The law is frozen in time, nothing beyond 1974 has any relevance or importance in interpreting paragraph 63, except a resumption of atmospheric testing.’¹¹³ Similarly, Judge Weeramantry emphasised that: ‘A court, faced with a science-oriented problem of present and future damage in 1995, cannot resolve it by ignoring the knowledge acquired between 1974 and 1995, and by applying to the problem in hand the knowledge of 1974. That would be an exercise in unreality.’¹¹⁴ For Judge Weeramantry,

¹⁰⁸ Ibid [63].

¹⁰⁹ *Request for an Examination* (n 104) [32]-[33].

¹¹⁰ See the discussion of this evidence in *ibid*, Diss. Op. Weeramantry 348-358.

¹¹¹ *Request for an Examination* (n 104) [34].

¹¹² Ibid [62]-[63].

¹¹³ Ibid, Diss. Op. Palmer [96]. See also [77].

¹¹⁴ Ibid Diss. Op. Weeramantry 340.

‘[i]f what seemed safe in 1974 now reveals its hazards in a manner not known or expected then, there is a responsibility lying upon the Court to take note of this change in the fundamental assumptions underlying its Judgment of 1974.’¹¹⁵ In contrast, Judge Shahabuddeen made a strong consent-based point against allowing New Zealand’s request, specifically that the Court could not have, through the proviso in the 1974 judgment, vested itself with jurisdiction over acts which post-dated France’s termination of jurisdiction in that year.¹¹⁶

Ultimately, it is perhaps unsurprising that faced with interpreting the 1974 judgment the Court construed the provision enabling an examination of the situation narrowly, reflecting that this was the only possible basis for jurisdiction in 1995, and the Court, given its characteristics, is particularly sensitive to consent-based concerns on jurisdictional issues.¹¹⁷ What my analysis has shown is that the underlying functional question facing the Court was how subsequent developments in facts, such as scientific knowledge, or developments in international environmental norms, could affect the basis of the 1974 judgment. These questions arose particularly sharply in this case given the immense expansion of international environmental law since the 1974 judgment,¹¹⁸ and the potential for the factual assumptions underpinning the Judgment to be affected by developments in scientific knowledge regarding risk. While the strictly consensual basis of the ICJ’s jurisdiction clearly shaped how the Court responded to these questions, the case is also representative of the broader challenges facing contemporary international adjudicators of responding to factual and legal change.

C. The Standard and Method of Review in ICJ Environmental Case Law

1. Standard of Review in ICJ Environmental Case Law

The problem of the standard or intensity of adjudicators’ review of primary, often national-level decision-makers’ determinations, and the consequent allocation of decision-making authority, is a key problem which arises in ICJ adjudication. While the terminology of a ‘standard of review’ is not entrenched in this context, the underlying

¹¹⁵ Ibid 329.

¹¹⁶ Ibid, Sep Op. Shahabuddeen 315.

¹¹⁷ Judge ad hoc Palmer noted that the majority decision followed in a tradition of caution by the ICJ based on considerations of jurisdictional consent: *ibid*, Diss. Op. Palmer [104]-[105]; Similarly: Malgosia Fitzmaurice, ‘International Protection of the Environment’ (2001) 293 RdC 9, 376.

¹¹⁸ See Diss. Op. Palmer, *ibid* [77].

functional problem is strongly present in relevant case law. The problem matters because, as in other adjudication contexts, it determines the allocation of decision-making authority between national-level decision-makers and international adjudicators or the balance between regulatory autonomy and state liability,¹¹⁹ and is not explicitly determined by treaty law. Furthermore, as in other adjudication settings, certain considerations are highly relevant to the appropriate standard of review, such as whether the national-level determination has involved an evaluation of local circumstances or the application of specialist forms of knowledge which international judges may not be well placed to second-guess. As we will see below, the ICJ has already drawn to some degree on the approach developed by WTO adjudicators to the standard of review in SPS cases. However, the treaty context in which the ICJ operates may be quite different, and will vary between cases.

The question of the appropriate standard of review received explicit attention in the *Whaling* case, where Australia, ultimately successfully, argued that permits granted by Japan were not covered by Article VIII of the Whaling Convention, which permits whaling ‘for purposes of scientific research’.¹²⁰ In order to determine whether Japan’s program was ‘for the purposes of’ scientific research,¹²¹ the Court asked ‘whether in the use of lethal methods, the programme’s design and implementation are reasonable in relation to achieving its stated objectives’, adding that the ‘standard of review is an objective one’.¹²² The relevant background here included that Japan had argued that the Court should approach the standard of review in a similar way to the approach developed in SPS cases in the WTO context. Specifically, Japan argued that the Court should limit its review to whether a reasonable state could regard Japan’s program as constituting scientific research, and avoid being drawn into debate over the scientific merits of the program.¹²³

¹¹⁹ Caroline Henckels, *Proportionality and Deference in Investor-State Arbitration: Balancing Investment Protection and Regulatory Autonomy* (CUP 2015) 30.

¹²⁰ Whaling Convention, Art VIII.

¹²¹ The Court first asked whether Japan’s program ‘involves scientific research’, which it answered affirmatively in a few paragraphs: *Whaling* (n 37) [86], [127]. Australia had advanced criteria to inform the meaning of ‘scientific research’ under the Convention and the Court rejected these and avoided offering an alternative definition: [70]-[86].

¹²² *Ibid* [67], see also [88].

¹²³ See CR 2013/22, [19]-[20], [31] (Lowe); For further background regarding how the concept of the ‘standard of review’ arose in the case over the course of the written and oral pleadings see Hamamoto (n 63) 39–42.

Just as other international adjudicators often stress that they are not well placed to engage in de novo review of determinations involving the application of specialist expertise which they do not hold, the ICJ emphasised that was not its role to ‘pass judgment on the scientific merit or importance of’ the scientific objectives of a whaling program, ‘[n]or ... to decide whether the design and implementation of a programme are the best possible means of achieving its stated objectives.’¹²⁴ Nevertheless, the Court’s analysis of a series of factors, drawn from the parties’ arguments,¹²⁵ to concretise its test of whether the design and implementation of Japan’s program was reasonable in relation to its stated objectives, suggests a standard of review that is far from affording Japan complete deference on the underlying determinations concerned.¹²⁶ For example, regarding Japan’s decision to use lethal methods in its research program, the Court emphasised Japan’s failure to explain why it had not considered the use of non-lethal means to achieve its research objectives.¹²⁷ Then, in reviewing the scale of lethal methods used, the Court stated that while it was not seeking ‘to second-guess the scientific judgments made by individual scientists or Japan’, it would examine whether, on the evidence, Japan, had ‘demonstrated a reasonable basis’ for the sample sizes selected, in light of the program’s stated research objectives,¹²⁸ and raised numerous doubts in this regard,¹²⁹ ultimately finding that the selected sample sizes were not reasonable.¹³⁰ Finally, the Court reasoned that the gap between Japan’s target sample sizes and the actual take of whales suggested ‘that the target sample sizes are larger than are reasonable in achieving’ the stated research objectives.¹³¹

The criticism that the Court had, through the above analysis, employed an inappropriately intense form of review, and accordingly pronounced on matters that, under the relevant

¹²⁴ *Whaling* (n 37) [88]. Similarly [69]; The majority did not engage with the issue of achieving an appropriate institutional balance under the Convention vis-à-vis the Scientific Committee: Guillaume Gros, ‘The ICJ’s Handling of Science in the Whaling in the Antarctic Case: A Whale of a Case?’ (2015) 6 JIDS 578, 604.

¹²⁵ See *Whaling*, *ibid* [88].

¹²⁶ In addition to endorsing the terminology ‘standard of review’, the *Whaling* judgment may be significant for the Court’s focus on the design and implementation of the state measure concerned. Potentially, this offers a method of reviewing state measures that is independent of the regulating state’s motivations: Caroline E Foster, ‘Methodologies and Motivations: Was Japan’s Whaling Programme for Purposes of Scientific Research’ in Fitzmaurice and Tamada (eds), *Whaling in the Antarctic* (n 63) 36–7.

¹²⁷ See *Whaling* (n 37) [141]–[144].

¹²⁸ *Ibid* [185], similarly [172].

¹²⁹ *Ibid* [181], [188]–[189], [198].

¹³⁰ *Ibid* [224]–[225].

¹³¹ *Ibid* [212], generally [209]–[212].

treaty regime, initially fell within Japan's discretion as the regulating state, subject to evaluation by the Scientific Committee of the IWC,¹³² was articulated in several of the dissenting judgments. For example, Judge Owada submitted that the Court was wrong to include within the scope of its review matters concerning the design and implementation of Japan's whaling program,¹³³ when, under the Whaling Convention, such matters were 'primarily left to the discretionary decision of the granting Government', and only subject to review by the Scientific Committee.¹³⁴ By expanding the scope of its review in this way, Judge Owada submitted that the majority had wrongly conducted a *de novo* review of Japan's program,¹³⁵ and taken a position on contested issues of scientific merit.¹³⁶ For him, under the Convention, the Court's role was limited to ensuring that a state was acting in good faith, and observing the established procedures.¹³⁷ While the concept of reasonableness could assist in checking that a decision was not "arbitrary" or patently out of bounds", besides such situations, the Court should not have substituted its own discretion for that of the regulating state.¹³⁸ Similarly, in their dissenting opinions Judges Abraham and Yusuf accused the Court of impermissibly assessing the scientific merit of Japan's program, and pronouncing on matters that were, under the Convention regime, subject to review by the Scientific Committee.¹³⁹

While the majority approach arguably went too far in the direction of scrutinising *de novo* some of Japan's underlying determinations, there is no radical difference from the legal techniques utilised in the other contexts studied.¹⁴⁰ As usual, adjudicators considered that

¹³² Under Paragraph 30 of the Schedule to the Whaling Convention there is a process established whereby states are obliged to provide proposed permits for scientific whaling to the IWC before they are issued in order to allow a sub-body, the Scientific Committee, to review and comment upon them.

¹³³ *Whaling* (n 37) Diss. Op. Owada [32].

¹³⁴ *Ibid* [19]-[21], [38].

¹³⁵ *Ibid* [38].

¹³⁶ *Ibid* [25], [38].

¹³⁷ *Ibid* [21], [28].

¹³⁸ *Ibid* [49]-[50].

¹³⁹ See *ibid*, Diss. Op. Abraham [33]-[36], [38]; Diss. Op. Yusuf [17], [44], [61].

¹⁴⁰ Gros argues that the WTO Appellate Body's approach from the SPS context was transposed very inexactly, since while the established WTO approach focuses on the decision-making process involved in the regulating member's risk assessment, in *Whaling* the ICJ did not focus on the decision-making process surrounding Japan's decision to issue the relevant permits, but on whaling program itself: Gros (n 124) 602-3, 606, 608-9; While it is correct that the established WTO approach is largely focused on the member's risk assessment process, panels are required to determine, as a final step, whether the results of a risk assessment 'sufficiently warrant' the SPS measure concerned: *United States-Continued Suspension of Obligations in the EC-Hormones Dispute-Report of the Appellate Body* (16 October 2008), WT/DS320/AB/R, [591]; Nevertheless, the criticism that the ICJ's analysis should have focused on Japan's decision to grant the special permits under Article VIII, rather than the program itself, is well founded and

they were not well placed to scrutinise the scientific merit of the underlying determinations, or whether the means chosen by the regulating state to achieve its goals were the best possible ones available, but, on the other hand, that Japan's reliance on the scientific whaling exception had to be subjected to a degree of scrutiny. Through its analysis the ICJ made a series of important normative choices which defined what would count as an adequate decision-making process for issuing a permit for scientific whaling.

The question of the appropriate standard of review, and consequent allocation of powers between international adjudicators and other decision-makers, has also been raised by recent ICJ cases concerning the obligation of domestic authorities to conduct an environmental impact assessment (EIA) in certain circumstances. As mentioned above, in *Pulp Mills* the Court interpreted an applicable treaty obligation:

in accordance with a practice which in recent years has gained so much acceptance among States that it may now be considered a requirement under general international law to undertake an environmental impact assessment where there is a risk that the proposed industrial activity may have a significant adverse impact in a transboundary context, in particular, on a shared resource.¹⁴¹

The Court further stated that:

it is for each State to determine in its domestic legislation or in the authorization process for the project, the specific content of the environmental impact assessment required in each case, having regard to the nature and magnitude of the proposed development and its likely adverse impact on the environment as well as to the need to exercise due diligence in conducting such an assessment.¹⁴²

This statement has often been 'interpreted as meaning that the environmental impact assessment obligation has no independent content and that there is simply a *renvoi* to domestic law'.¹⁴³ However, the dominant view which has emerged in recent ICJ case law

was noted by several judges: *Whaling* (n 37) Sep. Op. Xue [12]; Diss. Op. Yusuf [12]-[13], [17]; Dec. Keith [8].

¹⁴¹ *Pulp Mills (merits)* (n 78) [204].

¹⁴² *Ibid* [205]; Affirmed in *Certain Activities carried out by Nicaragua in the Border Area (Costa Rica v Nicaragua)* and *Construction of a Road in Costa Rica along the San Juan River (Nicaragua v Costa Rica)* (Judgment, 16 December 2015, unpublished) [104].

¹⁴³ *2015 joined cases* (n 142) Sep. Op. Dugard [18].

and commentary is that the appropriate standard of review is not one of complete deference to the national level.¹⁴⁴ Several judges in the recently decided joined cases between Costa Rica and Nicaragua emphasised that while domestic authorities are left a certain level of discretion – reflecting that they are better placed to determine the precise details of an EIA – a degree of international scrutiny is retained, through the requirement that the assessment be conducted in accordance with the standard of ‘due diligence’ in the prevailing circumstances.¹⁴⁵ Again, this is the functional question of the intensity with which international adjudicators should scrutinise the conduct of primary, typically national-level decision-makers, and the consequent allocation of decision-making authority. The significant deference afforded to national authorities is appropriate, given their greater familiarity with local circumstances, which will inform the content of an EIA, compared to detached international adjudicators. However, the fact that the obligation to conduct an EIA is subject to a variable, fact-specific standard of due diligence in the circumstances shows that space for international scrutiny is maintained. Future decisions by international adjudicators in scrutinising domestic-level EIAs may further clarify what counts as an acceptable domestic decision-making process in this area.

2. *Methods of Review in ICJ Environmental Case Law*

In the environmental case law reviewed, the methods of review utilised by the ICJ operate in a functionally similar way to the methods of review utilised in the other adjudication settings, although they are shaped by the particular contexts in which the Court adjudicates. First, I will show while the terminology of necessity testing is not entrenched in the ICJ case law reviewed, the Court has repeatedly used a test of reasonableness, developed from the specific treaty framework concerned, which involves asking whether an alternative measure, less restrictive of other protected interests, could have been

¹⁴⁴ As well as the case law discussed here see Alan Boyle, ‘Developments in the International Law of Environmental Impact Assessments and Their Relation to the Espoo Convention’ (2011) 20 RECIEL 227, 229 (drawing on the International Law Commission’s work in this area and arguing there is international oversight of domestic-level EIAs).

¹⁴⁵ *2015 joined cases* (n 142) Sep. Op. Donoghue [15]; Sep. Op. Dugard [18]; Judge Bhandari also outlined minimum international standards for conducting an EIA: Sep. Op. Bhandari [41]-[46]; The exact relationship between states’ general obligation to exercise due diligence to prevent significant transboundary harm and the obligation to conduct an EIA is debated. Some judges emphasised that the obligation to conduct an EIA is not free-standing but arises from states’ general due diligence obligation: Donghuh, *ibid* [13]; Sep. Op. Owada [18], [20]-[21]; Contrast Dugard, *ibid* [9]-[11], [17] (conducting an EIA is an independent obligation); See further Jutta Brunnée, ‘Procedure and Substance in International Environmental Law: Confused at a Higher Level?’ (2016) 5(6) ESIL Reflections.

adopted. Second, as in the other adjudication settings studied, with the exception WTO adjudication, there are limited examples of the ICJ utilising the third, controversial stage of proportionality analysis which involves an open-ended balancing of competing values.

a) Necessity or Least Restrictive Means Testing in the ICJ

In the ICJ cases surveyed, although the terminology of necessity testing is not entrenched, the Court often utilises a test of reasonableness, tied to the specific treaty framework or legal context concerned, which involves asking whether there were alternatives measures, less restrictive of other protected interests, which the regulating state could have utilised. Again, the *Whaling* case is instructive. As noted above, the factors used by the Court to concretise its test of whether a whaling program's design and implementation were reasonable in relation to the stated scientific objectives included 'decisions regarding the use of lethal methods' and 'the scale of the programme's use of lethal sampling'.¹⁴⁶ In a crucial part of its analysis, the Court highlighted several reasons why Japan's research plan should have included greater analysis of the feasibility of using non-lethal methods to achieve its research objectives.¹⁴⁷ These included that Japan had claimed that it did not use lethal methods more than was necessary to achieve its research objectives, but non-lethal methods were not practical in some circumstances or 'would involve "unrealistic" amounts of time and expense'.¹⁴⁸ The Court also noted that as Australia's experts had 'referred to significant advances in a wide range of non-lethal research techniques over the past 20 years', these should have been analysed in the design of Japan's program. Additionally, as discussed above, Japan was under a duty to give due regard to IWC resolutions and guidelines, which called 'upon States parties to take into account whether research objectives can be achieved using non-lethal methods'.¹⁴⁹

The ensuing analysis strongly resembles least restrictive means testing, with the Court highlighting Japan's failure to make greater 'use of non-lethal methods in order to reduce or eliminate the need for lethal sampling',¹⁵⁰ and failure to compare the relative costs of a program that more extensively used non-lethal alternatives.¹⁵¹ As scientific research was

¹⁴⁶ *Whaling* (n 37) [88].

¹⁴⁷ *Ibid* [137]-[144].

¹⁴⁸ *Ibid* [129], [137].

¹⁴⁹ *Ibid* [137].

¹⁵⁰ *Ibid* [144], similarly [141].

¹⁵¹ *Ibid* [143].

the protected aim under the relevant treaty provision, the Court, just as least restrictive means testing would suggest, held that lethal sampling could not be used on a greater scale than was reasonable for achieving the program's stated scientific objectives, for example for the extraneous purpose of funding research.¹⁵² At one point the Court even noted Japan's failure to refute the view of one of Australia's experts that Japan's program could attain 'nearly the same level of accuracy' as that sought with a smaller lethal take.¹⁵³ While the Court did not use the explicit label of least restrictive means testing, functionally the method of review employed is operating in a very similar way, balancing the interest protected by the scientific whaling exception with the partially competing protected interest of conservation, by ensuring that Japan could not use lethal methods on a greater scale than was required to achieve its scientific objectives.

A reasonableness test developed from the relevant treaty framework that operated very similarly to least restrictive means testing was also utilised in the *Dispute regarding Navigational and Related Rights*. In this case the Court was reviewing various Nicaraguan regulations concerning use of the River San Juan, which were challenged by Costa Rica as an unreasonable restriction on its treaty right of free navigation, and defended by Nicaragua as serving other protected interests under the treaty regime, such as environmental protection, law enforcement and navigational safety.¹⁵⁴ The Court stated that the regulating state 'has the primary responsibility for assessing the need for regulation and for choosing, on the basis of its knowledge of the situation, the measure that it deems most appropriate to meet that need', and that 'clear and specific facts' had to be advanced to show that a measure was unreasonable.¹⁵⁵ Crucially, in applying this test, the Court reasoned that Costa Rica had not shown that certain less restrictive alternative measures it had proposed were sufficient to achieve the regulatory purposes concerned,¹⁵⁶ or were practical in terms of cost and effectiveness.¹⁵⁷ Again, while this reasonableness test does not have the established structure of necessity or least restrictive means testing as developed in the WTO context, functionally it is operating in a similar way. Through this test, the Court is balancing Nicaragua's right to pursue the protected

¹⁵² Ibid [94], [142].

¹⁵³ Ibid [190].

¹⁵⁴ Many of the Nicaraguan regulations were found to be justified: *Navigational Rights* (n 92) [88]-[89], [104], [109], [118], [141].

¹⁵⁵ Ibid [101].

¹⁵⁶ Ibid [106].

¹⁵⁷ Ibid [128].

regulatory aims with Costa Rica's partially competing right to freedom of navigation, including by assessing whether the alternative measures proposed by the complaining party would actually secure the protected regulatory interests concerned, and were practically available in terms of cost. Like many of the adjudicatory decisions reviewed in other contexts, the ICJ was careful not to conclude without strong evidence that alternative measures, proposed by the complaining party, were actually available, reflecting that an overly strict form of necessity testing can undermine states' legitimate regulatory autonomy.

Necessity testing and the consideration of potential alternative, less restrictive measures also featured in *Gabčíkovo-Nagymaros* given Hungary's reliance on the customary international law defence of necessity. In explaining why Hungary had not made out this defence, the Court emphasised that even if Hungary faced serious ecological risks, as it claimed, Hungary had alternative measures available to it, other than abandoning the agreed works, for responding to such risks, even if the alternative measures envisaged by the Court would have been more costly.¹⁵⁸ The Court's stance on the availability of alternative measures reflects that in the law of state responsibility necessity can only be invoked as a defence for precluding the wrongfulness of an otherwise wrongful act if the act is the *only* means of safeguarding an essential interest of state against a grave and imminent peril.¹⁵⁹ Yet despite this particular context, which informs the strictness of the necessity test applied, the method of review operated to mediate between two protected, partially competing interests, specifically Czechoslovakia's interest in Hungary performing the agreed works and Hungary's interest in safeguarding an essential ecological interest of state.

b) Full Proportionality Review in the ICJ

In the ICJ cases reviewed there are limited examples of adjudicators engaging in full proportionality review where beyond checking whether a measure was the least restrictive means available to a regulating state adjudicators also balance in an open-ended way the relative importance of the competing interests at stake.¹⁶⁰ In *Navigational Rights*,

¹⁵⁸ *Gabčíkovo-Nagymaros*, [55]-[56].

¹⁵⁹ See ILC, 'Draft Articles on the Responsibility of States for Internationally Wrongful Acts with Commentaries' [2001] II(2) ILC Ybk 31, Art 25(1)(a).

¹⁶⁰ In addition to the examples discussed, another area where the concept of proportionality is utilised by the Court is maritime boundary delimitation. As noted in chapter one, such cases are not primarily

discussed above, the Court, in stating the criteria it would apply to determine if Nicaragua's regulations were permissible, suggested a final step whereby a regulation 'must not be unreasonable, which means that its negative impact on the exercise of the right in question must not be manifestly excessive when measured against the protection afforded to the purpose invoked'.¹⁶¹ On its face, this formulation endorses full proportionality review since it contemplates weighing the negative impact on the right affected (for example, freedom of navigation) against the protection a measure affords to the regulatory purpose pursued and potentially ruling the measure 'manifestly excessive' even where it was the only, or the only reasonably available, way to secure the regulatory interest concerned.¹⁶² Yet, when one considers the scrutiny applied to each contested regulation, as noted above, key parts of the Court's reasoning more clearly resemble necessity testing than full proportionality review, with the Court, for example, holding that the proposed alternative measures did not qualify as true alternatives because they would not secure the relevant regulatory aims,¹⁶³ or were not practically available in terms of cost or effectiveness.¹⁶⁴ Furthermore, the treaty regime provided a pre-existing balance between the parties' competing interests which the Court could readily apply to resolve some of the questions concerning the contested regulations, without engaging in an open-ended balancing exercise itself.¹⁶⁵ Accordingly, despite the Court's formulation in this case seeming to contemplate full proportionality review, the method of review applied in scrutinising Nicaragua's regulations resembled least restrictive means testing.

environmental cases. The role of proportionality is heavily shaped by the relevant context. In short, as a final step in the delimitation process, the Court seeks to check that there is not 'significant disproportionality' between the respective lengths of the parties' coasts and their shares of the area being delimited. The Court has stressed that it is not applying a proportionality test which would try to achieve a correlation between the lengths of the parties' coasts and their shares of the relevant area. Rather, it is merely checking that there is not any disproportion in the two ratios so great as to render the result inequitable, which must be answered on a case by case basis: *Territorial and Maritime Dispute (Nicaragua v Colombia)* (Judgment) [2012] ICJ Rep 624, [240]-[242]; *Maritime Delimitation in the Black Sea (Romania v Ukraine)* (Judgment) [2009] ICJ Rep 61, [210]-[213]; For analysis of the role of proportionality in this context, arguing that the lack of criteria for determining when disproportion exists is problematic see Yoshifumi Tanaka, 'Reflections on the Concept of Proportionality in the Law of Maritime Delimitation' (2001) 16 IJML 433, 458; See also Thomas Cottier, *Equitable Principles of Maritime Boundary Delimitation: The Quest for Distributive Justice in International Law* (CUP 2015) 541-549.

¹⁶¹ *Navigational Rights* (n 92) [87(5)].

¹⁶² Also reading it as full proportionality review: Henckels (n 119) 161.

¹⁶³ *Navigational Rights* (n 92) [106].

¹⁶⁴ *Ibid* [128].

¹⁶⁵ See eg *ibid* [115], [126].

Gabčíkovo-Nagymaros is a clear example of the ICJ engaging in a true balancing of the competing interests at stake, albeit in the context of the law of countermeasures where such balancing is well accepted. The Court held that Czechoslovakia's unilateral implementation of a variant of the original project, after Hungary's internationally wrongful suspension and termination of its part of the agreed works, 'was not a lawful countermeasure because it was not proportionate',¹⁶⁶ given it involved Czechoslovakia 'unilaterally assuming control of a shared resource, and thereby depriving Hungary of its right to an equitable and reasonable share of the' watercourse concerned.¹⁶⁷ This use of full proportionality review reflects the context of the law of countermeasures, where it is accepted that the relative importance of the interests protected by the primary norms concerned is one of the factors to be weighed in determining whether a countermeasure is commensurate with the initial internationally wrongful act.¹⁶⁸ The case does not support the idea that full proportionality review is emerging as a generally applicable method of review in the ICJ.

D. The Contribution of the ICJ to Broader Processes of Dispute Resolution

In the environmental cases reviewed there are repeated examples of the ICJ undertaking a prospectively focused and facilitative style of adjudication which seeks to encourage future cooperation between the parties and provide guidance on the applicable legal framework, while leaving the parties some scope to resolve their dispute. These practices are significant because they provide evidence of contemporary adjudication contributing to wider processes of dispute resolution and complementing other means of dispute resolution such as post-adjudication negotiation between the parties. By considering this aspect of ICJ practice alongside comparable developments in the other contexts studied this thesis extends existing analyses of the prospects of a prospectively focused and facilitative style of adjudication.

The ICJ's judgments in the *Fisheries Jurisdiction* cases¹⁶⁹ – which concerned Iceland's unilateral extension of its exclusive fisheries zone and the processes through which conservation measures for the relevant fish stocks should be taken – are a prime example

¹⁶⁶ *Gabčíkovo-Nagymaros* (n 84) [87].

¹⁶⁷ *Ibid* [85].

¹⁶⁸ ILC (n 159), Commentary to Article 51, [6]-[7]; *Gabčíkovo-Nagymaros* (n 84) [85].

¹⁶⁹ *Fisheries Jurisdiction (United Kingdom v Iceland)* (Judgment) [1974] ICJ Rep 3; *Fisheries Jurisdiction (Federal Republic of Germany v Iceland)* (Judgment) [1974] ICJ Rep 175.

of the Court placing the parties under a binding obligation to cooperate, and allowing them scope to resolve their dispute. In these cases, the Court noted that ‘[t]he most appropriate method for the solution of the dispute is clearly that of negotiation’, given that resolving the contested issues required ‘detailed scientific knowledge of the fishing grounds’ and ‘the relevant information and expertise would be mainly in the possession of the Parties’.¹⁷⁰ While the Court did set out a number of principles that the parties’ negotiations had to take into account, including the need to pay due regard to the interests of third states, the resolution of the dispute was left for the parties.¹⁷¹ This approach reflected that the Court found that the parties had an:

obligation to keep under review the fishery resources in the disputed waters and to examine together, in the light of scientific and other available information, the measures required for the conservation and development, and equitable exploitation, of those resources, taking into account any international agreement in force between them.¹⁷²

In short, these cases are an example of the Court clarifying the applicable legal framework and passing parts of the dispute back to the parties for further negotiation. However, it should be noted that the dispute was not actually resolved through negotiations between the parties, as contemplated by the Court, but through wider developments at the diplomatic level, specifically with the establishment of the Exclusive Economic Zone as part of the conclusion of UNCLOS.¹⁷³

Gabčíkovo-Nagymaros is another prominent example of a partly prospectively focused and facilitative style of adjudication being undertaken by the ICJ. In the prospective part of the Judgment the Court held that the parties were under a legal obligation to negotiate regarding how the treaty’s objectives could be fulfilled going forward, taking into account current environmental standards.¹⁷⁴ This should be understood in light of the fact that the

¹⁷⁰ Ibid (UK) [73]; Ibid (FRG) [65].

¹⁷¹ Ibid (UK) [79(3)-(4)]; Ibid (FRG) [77(3)-(4)]; See also Sep. Op. Dillard 67-71 (supporting the Court’s role in providing guidelines to facilitate negotiations in disputes regarding shared resources); Diss. Op. Gros [17]-[34] (criticising this aspect of the Judgment).

¹⁷² Ibid (UK) [72]. The Court also reasoned that the concept of preferential rights, developed in the Judgment, implicitly required negotiations between the parties: [74], [62]; Similarly: *ibid* (FRG) [64], [66], [52].

¹⁷³ Regarding developments after the Judgment see Cesare PR Romano, *The Peaceful Settlement of International Environmental Disputes: A Pragmatic Approach* (Kluwer Law International 2000) 170-173.

¹⁷⁴ *Gabčíkovo-Nagymaros* (n 84) [139]-[142], [155(2)(B)]; Judge Bedjaoui highlighted that the obligation to negotiate in good faith flowed from general international law concerning the environment and watercourses, not just the treaty: Sep. Op. Bedjaoui [69].

agreement submitting the case to the Court provided that once the Judgment was given, the parties would negotiate on the modalities for its execution.¹⁷⁵ Yet it is significant in terms of the style of adjudicatory review emerging that the Court's guidance was largely at the level of broad principle rather than specifics: in short, having made the major finding that the treaty regime remained in force, and was able to incorporate contemporary environmental standards, it was for the parties to negotiate to bring the project as it had been implemented within that regime.¹⁷⁶ The Court also suggested that the parties could 'profit from the assistance and expertise of a third party'.¹⁷⁷ The Judgment has not actually resolved the parties' dispute.¹⁷⁸ While the parties arguably have not fulfilled their obligation to negotiate in good faith,¹⁷⁹ the example also shows the potential pitfalls of a more facilitative style of adjudication, namely that if a judgment is too open-ended, it may not give the parties' sufficient guidance to resolve their dispute.¹⁸⁰ This risk is significant and must be remembered. Nevertheless, *Gabčíkovo-Nagymaros* remains a striking example of a facilitative and prospectively focused mode of adjudication, which attempts to assist the disputing parties to rebuild their relationship.¹⁸¹

The recently decided joined cases between Costa Rica and Nicaragua also provide significant evidence of the ICJ providing guidance on the legal obligations applicable to the parties' relationship and emphasising the need for future cooperation. In the case brought by Nicaragua, the Court found that Costa Rica, in constructing a road close to Nicaragua's territory, had not fulfilled its obligation to perform an EIA, given the risk of

¹⁷⁵ Special Agreement, Art 5(2), cited in *ibid* p12.

¹⁷⁶ *Gabčíkovo-Nagymaros* (n 84) [144]-[147].

¹⁷⁷ *Ibid* [143].

¹⁷⁸ Regarding developments since the Judgment see Tim Stephens, *International Courts and Environmental Protection* (CUP 2009) 185–186.

¹⁷⁹ Colter Paulson, 'Compliance with Final Judgments of the International Court of Justice since 1987' (2004) 98 AJIL 434, 449.

¹⁸⁰ Criticising the Judgment on such grounds: Laurence Boisson de Chazournes and Antonella Angelini, 'After "The Court Rose": The Rise of Diplomatic Means to Implement the Pronouncements of the International Court of Justice' (2012) 11 LPICT 1, 21; Christine Gray, 'Remedies' in Cesare PR Romano, Karen J Alter and Yuval Shany (eds), *The Oxford Handbook of International Adjudication* (OUP 2014) 877–8.

¹⁸¹ Kooijmans (n 2) 749; Address by Judge Stephen M Schwebel, President of the ICJ, to the UN General Assembly, 27 October 1997, <<http://www.icj-cij.org/court/index.php?pr=89&pt=3&p1=1&p2=3&p3=1%3E>>; Another example from beyond the environmental context which is often cited as an example of the ICJ acting as a mediator is *Passage through the Great Belt (Finland v Denmark)* (Provisional Measures) ICJ Rep [1991] 12; The Court declined to indicate provisional measures but noted that 'pending a decision of the Court on the merits, any negotiation between the Parties with a view to achieving a direct and friendly settlement is to be welcomed': *ibid* [35]; The case was settled through negotiations prior to a merits hearing. Reading the case in this way: Jennings and Higgins (n 2) [132].

significant transboundary harm posed by the project.¹⁸² Significantly, the Court stated that for any further works in the area, ‘Costa Rica remains under an obligation to prepare an appropriate environmental impact assessment ... should they carry a risk of significant transboundary harm.’¹⁸³ The Court further stated that ‘if the circumstances so require, Costa Rica will have to consult in good faith with Nicaragua, ... to determine the appropriate measures to prevent significant transboundary harm or minimize the risk thereof’.¹⁸⁴ In considering the situation going forward, as part of deciding on the remedies requested, the Court stated that:

Costa Rica has begun mitigation works in order to reduce the adverse effects of the construction of the road on the environment. It expects that Costa Rica will continue to pursue these efforts in keeping with its due diligence obligation to monitor the effects of the project on the environment. It further reiterates the value of ongoing co-operation between the Parties in the performance of their respective obligations in connection with the San Juan River.¹⁸⁵

In the case brought by Costa Rica, while the Court found that Nicaragua had not breached any procedural obligations owed to Costa Rica as a neighbouring state, it concluded this part of its analysis by noting Nicaragua’s commitment to perform a new EIA before any substantial expansion of its dredging program, including to assess the risk of transboundary harm and to ‘notify, and consult with, Costa Rica’.¹⁸⁶ All of these aspects of the case provide further evidence of the ICJ adjudicating with a partly prospective focus and clarifying the legal obligations of the parties in an effort to facilitate their future interactions.

In the *Pulp Mills* case the Court also emphasised the duty of the parties to cooperate prospectively, after it spent significant time explaining how the cooperative mechanism

¹⁸² 2015 *joined cases* (n 142) [153]-[162].

¹⁸³ Ibid [173].

¹⁸⁴ Ibid. This reflected the position under general international law that where an ‘environmental impact assessment confirms that there is a risk of significant transboundary harm, the State planning to undertake the activity is required ... to notify and consult in good faith with the potentially affected State, where that is necessary to determine the appropriate measures to prevent or mitigate that risk’: [104]. The Court did not examine Costa Rica’s failure to notify and consult with Nicaragua, reasoning that Costa Rica had not complied with the prior obligation to conduct an EIA: [168]; Judge Donoghue criticised the Court’s formulation of the obligation to notify and consult neighbouring states as too restrictive, noting such an obligation could arise at other stages, before an EIA was completed, and could include matters besides risk mitigation: Sep. Op. Donoghue [21]-[24].

¹⁸⁵ 2015 *joined cases* (n 142) [228].

¹⁸⁶ Ibid [112].

established by the relevant bilateral river treaty operated and why Uruguay had breached the procedural obligations owed.¹⁸⁷ Specifically, after concluding that Argentina had not proved that Uruguay had breached its treaty obligation to protect and preserve the aquatic environment and to prevent pollution,¹⁸⁸ the Court added a paragraph concerning the parties' ongoing monitoring obligations, which arose from the obligation to cooperate through the bilateral river commission established.¹⁸⁹ The Court concluded its judgment by again highlighting the ongoing duty of the parties to cooperate through the treaty framework established.¹⁹⁰ Within a few months of the Judgment, the two parties had agreed, through the bilateral river commission created by the treaty, to establish a joint environmental monitoring program.¹⁹¹ Clearly the existence of a standing institutional mechanism, which could be utilised after the Court's judgment, shaped the role played by the Court within a wider process of dispute resolution.

The *Whaling* case also deserves mention here because the Court's Judgment operated to clarify the framework in which this dispute continues to play out. As discussed above, the Court found that Japan had a duty to cooperate with the IWC and its Scientific Committee and to give 'due regard' to their recommendations.¹⁹² While the Court ordered that Japan revoke the existing permits, and not issue further permits, given its program did not fall within the treaty exception,¹⁹³ it was readily conceivable that Japan might attempt to design a new program, with the Court stressing that it was not resolving differences regarding whaling policy,¹⁹⁴ or ruling out the use of lethal methods per se.¹⁹⁵ In the event Japan did quickly design a new program, and the Court's judgment has featured heavily

¹⁸⁷ *Pulp Mills (merits)* (n 78) [80]-[158]. The Court found that Uruguay breached its procedural obligations to cooperate imposed by the treaty: [143]-[149], but not its substantive obligations under the treaty: [169]-[265]; In deciding on earlier requests for provisional measures the Court also emphasised the need for cooperation between the parties under the relevant bilateral river treaty: *Pulp Mills (Provisional Measures)* [2006] ICJ Rep 113, [81]-[84]; *Pulp Mills (Provisional Measures)* [2007] ICJ Rep 3, [53].

¹⁸⁸ *Pulp Mills (merits)* (n 78) [190], [265].

¹⁸⁹ *Ibid* [266].

¹⁹⁰ *Ibid* [281]; The Court also emphasised the parties' strong record of cooperation in *Gulf of Maine*, a delimitation case which involved an area containing shared fisheries resources relied upon by both parties: *Delimitation of the Maritime Boundary in the Gulf of Maine Area (Canada/United States of America)* (Judgment) [1984] ICJ Rep 286, [232], [240].

¹⁹¹ See Pablo Sandonato de León, 'Diplomatic and Judicial Means of Dispute Settlement and How They Got Along in the Pulp Mills Case' in Laurence Boisson de Chazournes, Marcelo G Kohen and Jorge E Viñuales (eds), *Diplomatic and Judicial Means of Dispute Settlement* (Martinus Nijhoff Publishers 2013) 84-5; de Chazournes and Angelini (n 180) 23 fn 72.

¹⁹² *Whaling* (n 37) [83].

¹⁹³ *Ibid* [245].

¹⁹⁴ *Ibid* [69].

¹⁹⁵ *Ibid* [83], [137].

in both the design of Japan's new program, and how the IWC has instructed its Scientific Committee to evaluate proposals for scientific research.¹⁹⁶ While the Court's judgment authoritatively clarified Japan's obligation to cooperate within the processes of the relevant international organisation, and shaped the criteria which have been used to evaluate future reliance on the treaty exception, it did not purport to, and has not, definitively resolved the parties' underlying dispute.

To be sure, there are instances where the ICJ might have allowed greater space for further negotiation between the parties and did not. A significant example is *Jan Mayen*, a delimitation case which had an environmental component with the parties 'in conflict over access to fishery resources'¹⁹⁷ and the Court deciding exceptionally to adjust the provisional delimitation line to achieve equitable access for both parties.¹⁹⁸ Norway, as respondent, argued that the Court should only have given a 'declaratory' judgment, which indicated the bases for delimitation, but left the precise drawing of the line for negotiation between the parties.¹⁹⁹ The Court rejected this approach, reasoning that it would 'not be a complete discharge of its duty to determine the dispute'.²⁰⁰ Arguably the main issue at stake, delimitation of a maritime boundary, was relatively well suited to final determination by a judicial pronouncement.²⁰¹ In contrast, disputes focused on the ongoing management of a shared resource, such as *Fisheries Jurisdiction*, the 2015 *joined cases*, or *Pulp Mills*, are more suited to resolution through post-adjudication cooperation between the parties. However, the approach in *Jan Mayen*, a case brought under the optional clause, should be contrasted with the approach taken in some other delimitation disputes submitted by agreement, where the parties agreed that the Court would indicate the applicable rules of international law and the parties would conduct the delimitation

¹⁹⁶ See Margaret A Young and Sebastián Rioseco Sullivan, 'Evolution through the Duty to Cooperate: Implications of the Whaling Case at the International Court of Justice' (2015) 16 MJIL 311, 319–321; Akiho Shibata, 'Conclusion: The Judgment, its Implications and Prospects' in Fitzmaurice and Tamada (eds), *Whaling in the Antarctic* (n 63) 395–407.

¹⁹⁷ *Maritime Delimitation in the Area between Greenland and Jan Mayen (Denmark v Norway)* (Judgment) ICJ Rep [1993] 38, [75]; On the environmental aspects of the case see especially Sep. Op. Weeramantry [235]–[244].

¹⁹⁸ Ibid [76], [90], [92].

¹⁹⁹ Ibid [88].

²⁰⁰ Ibid [89].

²⁰¹ Note that in concluding a treaty to implement the Judgment the parties departed in certain respects from the Court's Judgment: see Constanze Schulte, *Compliance with Decisions of the International Court of Justice* (OUP 2004) 222–224.

by agreement on the basis of the judgment.²⁰² This different context has led the Court, as in *Fisheries Jurisdiction*, to emphasise the obligation to negotiate,²⁰³ and indicate the factors to be taken into account by the parties in future negotiations.²⁰⁴ Yet, as others have noted, the downside of this approach is that it requires more diplomatic effort to implement the judgment, and accordingly states have, in other delimitation disputes, agreed that the Court can go beyond indicating the applicable principles.²⁰⁵ More broadly, these examples demonstrate that the ICJ's decisions frequently contribute to broader processes of dispute resolution.

E. Conclusion

This chapter has analysed how the three pressing problems focused on by this thesis are managed in the environmental case law of the ICJ. The above analysis demonstrates that in many respects the ICJ's practices are shaped by contextual considerations which are specific to the Court and the legal settings in which it has an opportunity to adjudicate. Yet the practices reviewed also provide insights into wider challenges experienced by adjudicators operating in other institutional contexts and possible legal responses.

The diversity of the ICJ's work, reflecting that it lacks any compulsory jurisdiction and generally does not hear repeated disputes concerning the same or similar legal frameworks or texts, is an important factor apparent in many of the practices discussed. How the problem of responding to potential changes in international law arose and was managed partly depended upon the particular treaty or other legal context in which the Court was adjudicating. For example, in the *Whaling* case the issue of whether the treaty exception for scientific whaling had narrowed over time had to be understood in light of the institutional structure created by the Whaling Convention, and developments within that setting that arguably shifted the balance within the Convention towards the interest of conservation. Similarly, in *Gabčíkovo-Nagymaros* the Court's interpretation of the

²⁰² See eg *North Sea Continental Shelf (Federal Republic of Germany/Denmark, Federal Republic of Germany/Netherlands)* (Judgment) [1969] ICJ Rep 3, 5-6 (Article 1 of the relevant agreements).

²⁰³ Ibid [85(a)]-[86].

²⁰⁴ Ibid [101].

²⁰⁵ See de Chazournes and Angelini (n 180) 11-12 (discussing *Gulf of Maine* (above n 190) where the Court was entrusted to determine the boundary, and other examples where the Court was permitted to give practical guidance on how the relevant rules could be applied). In the delimitation context there are also examples where an ICJ judgment has informed a wider diplomatic process, sometimes involving a third party, and often going beyond the issues before the Court, with the aim of resolving the wider dispute. See generally: ibid 17-29.

treaty in a manner that emphasised the obligation of the parties to take account of newly emerged environmental norms in implementing an existing project was possible because the relevant provisions were open to such a reading.²⁰⁶ The relevant treaty provisions in *Pulp Mills and Navigational Rights* – concerning respectively an obligation to protect and preserve the environment, and a right of free navigation for the purposes of ‘commerce’ – were also of a general nature and clearly open to being interpreted in a manner that would evolve in light of relevant developments in international law.

However, the problem arising in these disputes, namely how developments in wider international law might affect the meaning of existing treaty obligations, and the legal techniques utilised in response, was also plainly of wider relevance, beyond the particular treaty or legal context upon which the ICJ was adjudicating. The best evidence of this was that in *Navigational Rights* the Court formulated a general rule regarding when treaty terms are to be interpreted in an evolutive manner which has proved highly influential in subsequent international legal discourse.²⁰⁷ Similarly, the principle developed in *Gabčíkovo-Nagymaros*, that new environmental norms need to be taken into account when continuing existing activities, has proved highly transferable to other contexts where adjudicators have also updated aging treaty frameworks.²⁰⁸ The Court has also made important contributions to general international law concerning EIAs in deciding disputes under particular bilateral river treaties. As we saw in the last chapter, these contributions regarding the law of EIAs have been draw upon by UNCLOS adjudicators.

Overall, the ICJ has repeatedly made important contributions in updating aging treaty frameworks in light of wider international law, and formulating more generalisable statements, transferable to other contexts. An important aspect of what is occurring in these cases is that the ICJ is performing an informal coordination role, within the wider system of international law, as suggested in fragmentation debates.²⁰⁹ Other international courts sometimes perform a similar function of incorporating wider developments in international law into a treaty framework against the background of decentralised

²⁰⁶ See above n 85.

²⁰⁷ See eg *China–Measures Affecting Trading Rights and Distribution Services for Certain Publications and Audiovisual Entertainment Products–Report of the Appellate Body* (21 December 2009) WT/DS363/AB/R, [397] fn 705.

²⁰⁸ See eg *Indus Waters Kishenganga Arbitration (Pakistan v India) (Partial Award)* (2013) 154 ILR 1, [452]; *Iron Rhine Arbitration (Belgium v Netherlands) (Award)* (2005) 140 ILR 130, [59].

²⁰⁹ See above n 39.

international law-making: the AB's interpretation in *US-Shrimp*, considered in Chapter Three, is an excellent example. Yet this coordination or 'mainstreaming' role is particularly pronounced in the ICJ's work, reflecting its immense semantic authority, especially on matters of general international law. That semantic authority, in turn, owes a great deal to being the oldest permanent international tribunal and having a general rather than subject-specific jurisdiction.

The ICJ's approach to the issue of factual changes which may affect the application of a legal term was also shaped by contextual factors specific to the Court and yet representative of a broader problem that often faces international adjudicators. For example, in *Request for an Examination of the Situation* the fact that the Court was being asked by New Zealand to re-open a contentious case, in a situation where consent to jurisdiction no longer existed, was highly relevant to understanding the majority's refusal to take account of developments in scientific understanding since 1974. While the case demonstrated in acute terms the ICJ's general bias towards consent on jurisdictional issues, at a more general level the Court was facing the problem seen in other adjudication settings that assumptions regarding risk can be thrown into doubt by new scientific evidence.

The ICJ's approach to the problems of the appropriate standard and method of review should also be understood as shaped by the particular treaty and legal context in which it was adjudicating, and nevertheless representative of key challenges facing international adjudicators more generally. For example, in the *Whaling* case the Court developed its reasonableness test which it applied to decide upon Japan's reliance on the treaty exception in light of a series of factors drawn from the parties' arguments and IWC resolutions. At one level all of this could be seen as specific to the Whaling Convention. Yet that would miss several contributions the ICJ made regarding the wider issue of the standard and method of review in international adjudication. The fact that the Court used the term 'standard of review' and cited to the WTO's SPS practice on the matter suggests that the Court saw itself as part of a wider set of bodies engaged in reviewing state conduct, and specifically states' reliance on contested science-based determinations, for compliance with international norms.²¹⁰ As in the other adjudication contexts considered,

²¹⁰ Foster (n 126) 16.

the ICJ avoided evaluating the scientific merit of Japan's research aims, which it was ill-equipped to do, but nevertheless made important normative choices regarding what would count as an acceptable domestic decision-making process. Furthermore, the reasonableness test developed by the ICJ to balance the competing protected interests under the Whaling Convention, although clearly shaped by the treaty context, operated in a functionally very similar manner to necessity or least restrictive means testing, utilised as a method of review in the other settings studied.

Staying with the problem of the standard and method of review, the reasonableness test applied in *Navigational Rights*, although developed by the ICJ from the relevant treaty framework, operated in a manner highly analogous to least restrictive means testing to balance one state's right to regulate and another's right to freedom of navigation. The ICJ's reasoning in *Navigational Rights* that a regulating state will be best placed to assess the need for regulation, and that any alternative measures proposed by a complainant would need to be shown to achieve the relevant regulatory aim, and be practically available, fits within a broader pattern regarding how international adjudicators are resolving such questions. Like other international tribunals, the ICJ did not want to second-guess the choices made by a regulating state without clear evidence that any proposed alternative measure would be equally effective and was reasonably available in terms of cost. Similarly, the ICJ's deference to national-level decision-makers regarding the specific requirements of an EIA in particular cases, subject to a due-diligence requirement, reflects a broader pattern. In short, international adjudicators have often recognised that they are, compared to national-level authorities, ill-equipped to assess local circumstances, and yet some degree of international scrutiny must be maintained. We saw this broader issue in the last chapter, in the form of ITLOS judges affording deference to coastal states who were more familiar with local circumstances. We will see it again next chapter in the form of investment arbitrators affording deference to domestic-level decision-makers who have greater familiarity with local circumstances.

The partly prospectively focused style of adjudication which was present in many of the ICJ cases reviewed was also shaped in important ways by contextual factors. Within these cases the issues raised were typically ones which required cooperation between neighbouring states or states interested in a particular shared resource. In many of these cases it was clear that cooperation would be needed after the judgment, for example to

complete a project, conduct environmental monitoring, or take conservation measures. The ICJ did not always have sufficient knowledge or expertise to resolve the issues in dispute, as the Court itself noted regarding the conservation measures needed in *Fisheries Jurisdiction*. In many of these disputes the relevant treaty established a significant institutional framework for cooperation that could be utilised after the ICJ's judgment. For example, in the *Pulp Mills* case cooperation after the Judgment occurred through the bilateral river commission established under the relevant treaty, and in the *Whaling* case the Judgment has informed later interactions within the IWC and its Scientific Committee. As demonstrated, how a case comes to the ICJ matters because the parties may, if submitting the dispute via agreement, decide that the Court is to indicate principles on the basis of which they will negotiate, or the parties may request that the Court make more specific determinations, such as itself delimiting a maritime boundary.

While it is important to note the contextual considerations which explain why we see such a facilitative style of adjudication relatively frequently in ICJ case law, these developments should not be understood as unique to this setting. As demonstrated in the last chapter, within UNCLOS adjudication there is substantial support, both within case law and commentary, for the idea that adjudication might complement cooperation between the parties, and that such an approach can lead to more effective dispute resolution. UNCLOS cases, like the ICJ cases discussed, have often concerned the management of shared resources, where the disputing parties will have an ongoing relationship after adjudication, and international tribunals do not necessarily have the technical knowledge to prescribe a solution. Similarly, while WTO adjudication occurs within a specific institutional setting, which creates comparatively clear avenues for pursuing compliance, a meaningful analogy exists with the ICJ practices considered: in both instances adjudication is operating to clarify the parties' legal obligations – including their obligations to have regard to affected foreign interests and pursue cooperative solutions – and to facilitate their future interactions. In both contexts we see examples of the disputing parties rebuilding their relationship after adjudication, assisted by the clarification which an authoritative third party determination of contested legal issues can provide.

The next chapter turns to investment treaty arbitration. It will demonstrate and explain why investment treaty arbitration exhibits some crucial differences from the other

adjudication contexts studied in relation to the role of adjudicators as ‘dispute resolvers’ and as managers of change. Yet investment arbitration is not truly incomparable to other key sites of public international law adjudication and I will explain why it also demonstrates certain aspects of similarity with the other adjudication settings studied.

VI. INVESTMENT TREATY ARBITRATION

This chapter analyses the three pressing problems facing international adjudicators traced throughout this thesis in relation to the most active and high profile site of international adjudication in recent years, the decentralised but relatively comprehensive regime for investor-state arbitration. The essential parameters of this regime are well known: over 3000 investment treaties, mostly of a bilateral nature, have been concluded, many of which contain general clauses granting covered investors direct access to international arbitration against the host state without any requirement to exhaust local remedies.¹ While states have for a long time concluded contractual agreements with specific foreign investors, what makes the ‘BIT era’² fundamentally different is the widespread emergence of general, treaty-based consent to adjudication over future disputes with an indeterminate class of foreign investors.³ For this reason, although bilaterally constructed, this regime operates much like a major multilateral structure, providing general standards for ordering states’ behaviour in relation to foreign investments. Since the first treaty-based dispute was filed in 1987,⁴ the total number of known treaty-based claims filed has risen to 739. To date, some 471 treaty-based arbitrations have been concluded. A record 72 treaty-based claims were filed in 2015 alone.⁵ In terms of cases with an environmental component, in a recent survey Viñuales categorised some 114 such investor-state disputes, all but 12 of which were filed since the year 2000.⁶ Strikingly, half of these 114 disputes were filed since the year 2012,⁷ reflecting a boom in cases arising from certain states’ policies for incentivising renewable energy sources.

The future of the international regime for investor-state arbitration is, of course, far from clear. While a legitimacy crisis and reform proposals have been prominent in the regime

¹ On the time-limited or non-existent requirement to exhaust local remedies under investment treaties see below text at n 220-222.

² To paraphrase W Michael Reisman and Robert D Sloane, ‘Indirect Expropriation and its Valuation in the BIT Generation’ (2004) 75 BYBIL 115.

³ Gus Van Harten and Martin Loughlin, ‘Investment Treaty Arbitration as a Species of Global Administrative Law’ (2006) 17 EJIL 121, 128; Campbell McLachlan, Laurence Shore and Matthew Weiniger, *International Investment Arbitration: Substantive Principles* (OUP 2008) 4–5.

⁴ *Asian Agricultural Products Ltd (AAPL) v Sri Lanka (Final Award)* (ICSID Case No. ARB/87/3, 27 June 1990).

⁵ Figures from UNCTAD’s ‘Investment Dispute Settlement Navigator’, 10 December 2016, <<http://investmentpolicyhub.unctad.org/ISDS>>.

⁶ Jorge E Viñuales, ‘Foreign Investment and the Environment in International Law: The Current State of Play’ in Kate Miles (ed), *Research Handbook on Environment and Investment Law* (Edward Elgar Publishing Forthcoming) <http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2661970>. Viñuales includes some contract-based disputes whereas UNCTAD, *ibid*, only counts treaty-based disputes.

⁷ *Ibid*.

for over a decade,⁸ more recently the political will to significantly alter the shape of this regime seems to be emerging.⁹ In September 2015, the European Commission proposed an ‘Investment Court System’ which would replace the existing system of ad hoc arbitration in all future EU investment agreements, and stated that it would also work with other countries towards creating a permanent ‘International Investment Court’ that would replace dispute resolution mechanisms in existing investment treaties.¹⁰ A revised version of the EU-Canada Comprehensive Economic and Trade Agreement, and the EU-Vietnam Free Trade Agreement, both released in early 2016, incorporate the proposed ‘Investment Court System’. The basic architecture is partly modelled on WTO dispute settlement, and includes a permanent first-instance tribunal and permanent appellate tribunal, both consisting of members appointed for several-year terms.¹¹ In stark contrast to the existing system of ad hoc arbitration, the members of these permanent tribunals would be: jointly appointed by the treaty parties, meaning the influence over tribunal composition of disputing investors or appointing institutions would be removed;¹² assigned cases randomly;¹³ and prevented, once appointed, from acting as counsel or expert witnesses in investment disputes.¹⁴

At the time of writing, in the context of intense legitimacy concerns over investor-state dispute settlement, there is also serious doubt over the future of two agreements which would massively expand the reach of this adjudication mechanism. Respectively, it appears unlikely that the Trans Pacific Partnership, concluded in October 2015, will be ratified by the United States and accordingly enter into force,¹⁵ or that ongoing

⁸ See Joshua Paine, ‘The Project of System-Internal Reform in International Investment Law: An Appraisal’ (2015) 6 JIDS 332.

⁹ In addition to the developments discussed in text see UNCTAD, ‘Taking Stock of IIA Reform’ (IIA Issues Note No. 1, 2016) 1; UNCTAD, ‘World Investment Report 2015 - Reforming International Investment Governance’.

¹⁰ European Commission, ‘Commission Proposes New Investment Court System for TTIP and Other EU Trade and Investment Negotiations’ (16 September 2015) <<http://trade.ec.europa.eu/doclib/press/index.cfm?id=1364>>.

¹¹ See Comprehensive Economic and Trade Agreement between Canada and the European Union (final text after legal scrubbing, February 2016) Arts 8.27-8.28, <http://trade.ec.europa.eu/doclib/docs/2016/february/tradoc_154329.pdf> (‘CETA’); EU-Vietnam Free Trade Agreement (Agreed Text of January 2016) ch 8(II) ‘Investment’, s 3(4), Arts 12-13 <http://trade.ec.europa.eu/doclib/docs/2016/february/tradoc_154210.pdf> (‘EU-Vietnam FTA’).

¹² CETA, Arts 8.27(2), 8.28(3); EU-Vietnam FTA, ch 8(II), s 3(4), Arts 12(2), 13(3).

¹³ CETA, Arts 8.27(7), 8.28(5); EU-Vietnam FTA, ch 8(II), s 3(4), Arts 12(7), 13(9).

¹⁴ CETA, Art 8.30(1); EU-Vietnam FTA, ch 8(II), s 3(4), Art 14(1).

¹⁵ The Agreement is drafted such that in practice it can only enter into force if the United States ratifies it: Trans-Pacific Partnership Agreement (signed version, 4 February 2016), Art 30.5 (‘TPP’).

negotiations between the United States and the European Union concerning the Transatlantic Trade and Investment Partnership will be concluded.¹⁶ In this context it would be futile to predict the future shape of this regime, which remains a major site of political struggle, and may become clear in a piecemeal fashion, just as it emerged.¹⁷ This chapter is focused on investment treaty arbitration as it currently exists. Even if the future shape of this regime changes substantially, the large number of cases already concluded and the significant number afoot mean this is undoubtedly one of the most significant sites of contemporary public international law adjudication.¹⁸

This chapter continues the overall inquiry into how adjudicators might discharge their functions given the demands of the contemporary international legal order and the limitations of their roles. It will develop a series of conclusions regarding how the practices of investment arbitrators are shaped by the particular context in which they operate. I will explain why some of the practices demonstrate significant and underappreciated differences with the other adjudication mechanisms studied. However, investment treaty arbitration is not truly incomparable or *sui generis*, and I will explain why the challenges faced by adjudicators, and legal techniques utilised in response, also display certain similarities with the practices of adjudicators in the other contexts studied. The chapter proceeds as follows. Part A analyses key contextual features of this adjudication setting to provide an institutionally sensitive basis for the analysis undertaken. Part B analyses how investment treaty arbitrators have experienced and managed the problem of balancing the competing interests of stability and change. It demonstrates that investment arbitrators play a role in managing change in international legal norms, in a similar manner to how adjudicators in the other contexts studied also contribute, alongside other actors within a regime, to processes of law-development. However, investment arbitrators, by applying investment treaty standards in particular disputes, also perform a distinct role of deciding on the permissible degree of change

¹⁶ Regarding both agreements see eg ‘As New “Trump” Reality Sinks In, Questions Grow Over Future Trade Policy’ (17 November 2016) 20(39) *Bridges Weekly* 1.

¹⁷ See Joost Pauwelyn, ‘At the Edge of Chaos?: Foreign Investment Law as a Complex Adaptive System, How It Emerged and How It Can Be Reformed’ (2014) 29 *ICSID Review* 372; So far only a few countries have tried to exit the contemporary investment regime in any comprehensive way: see Jeswald W Salacuse, *The Law of Investment Treaties* (2nd edn, OUP 2015) 19–23.

¹⁸ Frédéric Gilles Sourgens, *A Nascent Common Law: The Process of Decision-Making in International Legal Disputes between States and Foreign Investors* (Brill Nijhoff 2015) 8; José E Alvarez, *The Public International Law Regime Governing International Investment* (Martinus Nijhoff 2011) 429.

within the host state's regulatory system, in the context of an investor's interest in stability and a host state's need to adapt regulation to new demands.

Part C considers how investment treaty arbitrators have managed the interrelated questions of the appropriate standard and method of review for scrutinising states' compliance with investment treaty norms. While the context of investment treaty arbitration shapes how these issues arise, the responses developed by arbitrators exhibit important similarities with those of other adjudicators also facing environmental disputes involving contested science-based determinations or competing ecological and commercial interests. Part D considers how investment treaty arbitration contributes to broader processes of dispute resolution. It demonstrates and seeks to explain why, as compared to the other contexts studied, adjudication in this regime is largely retrospectively focused, and there is comparatively little attention paid to providing guidance for the disputing parties' future interactions, including the potential rebuilding of their relationship after adjudication. Part E draws together the key findings emerging from my analysis.

A. Institutional Context for Investment Treaty Arbitration

1. The Contemporary International Investment Regime

Within the contemporary investment regime arbitral awards are frequently rendered either under the large number of bilateral investment treaties (BITs) in force, or under a smaller number of plurilateral treaties such as the North American Free Trade Agreement (NAFTA)¹⁹ or the Energy Charter Treaty.²⁰ Investment treaties commonly provide a choice of arbitral frameworks and institutions for investor-state dispute settlement, most prominently the ICSID Convention and its Arbitration Rules,²¹ administered by the International Centre for Settlement of Investment Disputes (ICSID), a subsidiary body of the World Bank, or the UNCITRAL arbitration rules, which are not tied to a particular institution and are commonly administered by ICSID, the Permanent Court of Arbitration,

¹⁹ North American Free Trade Agreement (1992) 32 ILM 296, ch 11.

²⁰ Energy Charter Treaty (1994) 2080 UNTS 95.

²¹ Convention on the Settlement of Investment Disputes between States and Nationals of Other States (1965) 575 UNTS 159 ('ICSID Convention'); ICSID Rules of Procedure for Arbitration Proceedings (2006) ('ICSID Arbitration Rules'); The ICSID Additional Facility Rules is a set of rules administered by the ICSID Secretariat for proceedings where a respondent state, or the claimant investor's state is not party to the ICSID Convention: ICSID Additional Facility Rules (2006), Art 2.

or commercial arbitration centres.²² In addition to providing detailed procedural rules that govern arbitration, these frameworks are tied to powerful multilateral enforcement mechanisms. Under the ICSID Convention, which currently has 153 contracting states, states must recognise and enforce awards rendered under the Convention as if they were a final judgment of a domestic court,²³ subject to the possibility of a limited annulment procedure established under the Convention.²⁴ Investment awards rendered under the UNCITRAL rules rely on enforcement under the 1958 New York Convention, which has 156 parties, and requires States Parties to recognise and enforce arbitral awards in their territory subject to limited grounds for review by domestic courts.²⁵

As others have highlighted, although this regime is bilaterally constructed, and important differences between treaties exist, for several reasons it operates in its totality as something closer to a multilateral regime which creates general standards that constrain states' conduct towards foreign investors.²⁶ First, most investment treaties contain a small number of common standards for host state conduct such as non-discrimination obligations of national treatment and most-favoured nation (MFN) treatment, guarantees to provide fair and equitable treatment and full protection and security to covered investments, restrictions on direct and indirect expropriation, and provision for free transfers of capital.²⁷ As mentioned this is typically combined with the powerful enforcement mechanism of providing for investor-state arbitration concerning breach of the promised standards of treatment.²⁸ The treaties also largely share the same object and purpose of protecting and promoting investment in order to increase capital flows and ultimately the prosperity of the treaty parties.²⁹ Second, participants in this regime

²² UNCITRAL Arbitration Rules (2010); In addition to the ICSID and UNCITRAL arbitration rules, many commercial arbitration centres have their own arbitration rules which are less commonly used for investment treaty disputes. See Rudolf Dolzer and Christoph Schreuer, *Principles of International Investment Law* (2nd edn, OUP 2012) 238–245.

²³ ICSID Convention, Art 54(1).

²⁴ ICSID Convention, Art 52.

²⁵ Convention on the Recognition and Enforcement of Foreign Arbitral Awards (1958) 330 UNTS 38, Arts III, V.

²⁶ Jeswald W Salacuse, 'The Emerging Global Regime for Investment' (2010) 51 HILJ 427, 431–2; Stephan W Schill, *The Multilateralization of International Investment Law* (CUP 2009) 368, 373, 377; Van Harten and Loughlin (n 3) 124–5; McLachlan, Shore and Weiniger (n 3) 19–20.

²⁷ Schill, *Multilateralization* (n 26) 74–5; Salacuse (n 26) 452.

²⁸ Salacuse (n 26) 446–7.

²⁹ Federico Ortino, 'The Investment Treaty System as Judicial Review' (2013) 24 Am Rev Int Arb 437, 440–42; Salacuse (n 26) 427–8; Schill, *Multilateralization* (n 26) 66; Caroline Henckels, *Proportionality and Deference in Investor-State Arbitration: Balancing Investment Protection and Regulatory Autonomy*

frequently refer to awards rendered under different, unrelated treaties, for example to support an argument regarding how a particular provision should be interpreted.³⁰ It is extremely common to argue from the implicit assumption that investment treaties do constitute a wider regime.³¹

Third, contemporary investment treaties share common origins in a small number of failed multilateral draft treaties developed in the 1950s and 1960s.³² While no multilateral regime was agreed, the same standards were carried into the current bilaterally constructed regime.³³ Moreover, many capital exporting and capital importing states utilise model investment treaties which form a default negotiating position,³⁴ and are revised periodically as part of a ‘feedback loop’ whereby existing developments in the regime, including arbitral decisions under other unrelated agreements, influence how states draft future treaties.³⁵ Fourth, nearly all investment treaties include the MFN obligation, which has the effect that a foreign investor is entitled to the most favourable treatment extended by a host state to investors of any other nationality in any of its investment treaties.³⁶ Finally, the broad definition of an investment contained in investment treaties combined with the realities of corporate structuring means that where the home state of an investor does not have an investment treaty with the host state, an investor can attempt to gain protection by creating a subsidiary in a third state which does have a BIT with the host state.³⁷

(CUP 2015) 8–9; See eg the preambles in the following model treaties: Canada Model BIT (2004); US Model BIT (2012); India Model BIT (2015); available at <<http://investmentpolicyhub.unctad.org/IIA>>.

³⁰ McLachlan, Shore and Weiniger (n 3) 18; See also Sourgens (n 18) 361–2.

³¹ Salacuse (n 26) 435–6; Schill, *Multilateralization* (n 26) 367–8.

³² McLachlan, Shore and Weiniger (n 3) 6.

³³ See Schill, *Multilateralization* (n 26) 89–92.

³⁴ McLachlan, Shore and Weiniger (n 3) 14.

³⁵ Jürgen Kurtz, ‘Building Legitimacy Through Interpretation in Investor-State Arbitration: On Consistency, Coherence, and the Identification of Applicable Law’ in Zachary Douglas, Joost Pauwelyn and Jorge E Viñuales (eds), *The Foundations of International Investment Law: Bringing Theory into Practice* (OUP 2014) 273.

³⁶ Schill, *Multilateralization* (n 26) 365–6 and ch iv; McLachlan, Shore and Weiniger (n 3) 6; However, there is a major debate regarding whether the MFN clause can be applied, beyond the substantive standards of treatment within a treaty, to the consent to arbitration given by the host state, including to avoid restrictions on that consent: see Tony Cole, ‘The Boundaries of Most Favored Nation Treatment in International Investment Law’ (2012) 33 Michigan JIL 537.

³⁷ Schill, *Multilateralization* (n 26) 366 and ch v; Van Harten and Loughlin (n 3) 139; However, if a dispute with a state is already foreseeable and an investor restructures its investment to gain treaty protection the investor’s claim will constitute an abuse of process: see *Philip Morris Asia Ltd v Commonwealth of Australia* (Award on Jurisdiction and Admissibility) (PCA Case No. 2012-12, 17 December 2015) [554], [585]–[588].

None of the above is to deny that important differences in the provisions of investment treaties exist and need to be considered. That, however, is no different from the basic point stressed throughout this thesis that is important to pay careful attention to the particular context in which adjudicators operate. Thus, while differences between investment treaties remain important, it makes sense to think of investment law and arbitration as giving rise to a wider, functionally oriented regime, beyond the particular bilateral treaties constructing it. In a similar manner to other major multilateral regulatory regimes studied, such as the WTO or UNCLOS, the vast network of investment treaties creates a set of broadly similar standards for state conduct,³⁸ backed up by a common enforcement mechanism of arbitration.³⁹

2. *The Adjudicators in Investment Treaty Arbitration*

Investor-state tribunals nearly always consist of three arbitrators.⁴⁰ The standard procedure, provided for in the ICSID Convention and many investment treaties, is that each party appoints one arbitrator, and the third, who is the president of the tribunal, is appointed by the agreement of the parties.⁴¹ Under the ICSID Convention, where a tribunal is not constituted within 90 days of a request for arbitration being registered – for example because the parties cannot agree upon a chair – either party can request the Chairman of ICSID’s Administrative Council⁴² to appoint the remaining arbitrators, who must consult both parties as far as possible.⁴³ Arbitrators appointed by the Chairman cannot be nationals of the disputing parties,⁴⁴ and must come from the Panel of Arbitrators, maintained by ICSID,⁴⁵ to which states, as contracting parties to the ICSID Convention, can nominate four persons.⁴⁶ Under the ICSID Convention, party-appointed arbitrators cannot be nationals of the disputing parties, however, there is an exception if each member of the tribunal is appointed by the agreement of the parties.⁴⁷ Party-

³⁸ Schill, *Multilateralization* (n 26) 373, 377; Salacuse (n 26) 431.

³⁹ McLachlan, Shore and Weiniger (n 3) 19–20; Schill, *Multilateralization* (n 26) 368; Van Harten and Loughlin (n 3) 124–5.

⁴⁰ Dolzer and Schreuer (n 22) 279.

⁴¹ ICSID Convention, Art 37(2)(b); Similarly, US Model BIT (2012), Art 27(1); NAFTA, Art 1123.

⁴² The Chairman is the President of the World Bank (ICSID Convention Art 5), but in practice acts upon the recommendation of ICSID’s Secretary General; ICSID’s Secretary General is explicitly made the appointing authority under many investment treaties: eg US Model BIT (2012), Art 27(2).

⁴³ ICSID Convention, Art 38.

⁴⁴ *Ibid.*

⁴⁵ *Ibid* Art 40(1).

⁴⁶ *Ibid* Arts 12–13.

⁴⁷ *Ibid* Art 39; ICSID Arbitration Rules, r 1(3).

appointed arbitrators may, and often do, come from outside ICSID's Panel of Arbitrators, but must still possess the same characteristics,⁴⁸ which include that they are 'of high moral character and recognised competence in the fields of law, commerce, industry or finance' and can be relied upon to exercise independent judgment.⁴⁹ Arbitrators can be disqualified if they manifestly lack such qualities, and are sometimes challenged for lack of independence.⁵⁰ Recent investment treaties have sought to impose additional requirements concerning independence and conflicts of interest.⁵¹

Comprehensive empirical studies have shown that to date investment treaty arbitration has been dominated by a relatively small group of frequently appointed arbitrators, the majority of whom are male, are nationals of a limited number of western developed states, and have a background in private practice or less commonly academia.⁵² Compared to other settings the bench is more polarised with the most prominent arbitrators being repeatedly appointed either by claimant investors or host states.⁵³ Arbitrators have a right to append an individual opinion,⁵⁴ and while the frequency of dissent is higher than WTO adjudication, it is not clearly higher than many other international tribunals nor as high as might be expected given the use of party-appointed arbitrators, the novelty of this legal field and its ideological divisions.⁵⁵ Given there is no permanent bench or appellate mechanism, and tribunals may operate in materially different treaty contexts, investment treaty arbitration does not exhibit the degree of consistency of jurisprudence apparent in particular in the WTO context. Nevertheless, tribunals do engage in extensive consideration of prior awards, and the relatively small group of frequently appointed arbitrators enables certain approaches to consolidate over time.

⁴⁸ ICSID Convention, Art 40.

⁴⁹ ICSID Convention, Art 14(1).

⁵⁰ Challenges are decided by the remaining arbitrators, or if they cannot agree or the majority of arbitrators is challenged, the Chairman of ICSID's Administrative Council: ICSID Convention, Art 57; ICSID Arbitration Rules, r 9.

⁵¹ See above n 14.

⁵² Joost Pauwelyn, 'The Rule of Law without the Rule of Lawyers? Why Investment Arbitrators Are from Mars, Trade Adjudicators from Venus' (2015) 109 AJIL 761, 769–783; Sergio Puig, 'Social Capital in the Arbitration Market' (2014) 25 EJIL 387, 404–422.

⁵³ Pauwelyn (n 52) 782; Puig (n 52) 404.

⁵⁴ ICSID Arbitration Rules, r 47(3).

⁵⁵ Catherine A Rogers, 'The Politics of International Investment Arbitrators' (2013) 12 Santa Clara JIL 223, 242–246 (discussing existing debates on dissenting opinions including certain classification problems with a previous estimate of a 22% dissent rate).

3. *The Goals of Investment Treaty Arbitration*

Arbitral tribunals constituted under investment treaties clearly have the function of resolving disputes between foreign investors and host states. The ICSID Convention and investment treaties explicitly endorse this idea.⁵⁶ Some investment tribunals have observed that their primary function is to decide the dispute before them given that they are constituted to hear a single, particular dispute between a covered investor and a host state.⁵⁷ The idea that dispute settlement is a central goal of investment treaty arbitration is also supported by the widely repeated claim in this regime that international arbitration has been chosen to provide foreign investors an effective, independent remedy, to shield the home state from diplomatic pressure that might otherwise be exerted, and to prevent investment disputes affecting the broader interstate relationship between the treaty parties.⁵⁸

As regards the law-development function of investment treaty tribunals, as with the other adjudication contexts studied there is little in the relevant constituent instruments to support this function and yet fairly wide acknowledgment that tribunals do, in deciding the disputes presented to them, play an important role in clarifying and developing relevant investment treaty standards,⁵⁹ and wider points of general international law.⁶⁰ Investment tribunals have often recognised that while they are not bound by the decisions of other arbitral tribunals, and must keep in mind the specifics of the applicable treaty and the case at hand, they nevertheless do have a wider, systemic role in contributing to the development of investment law.⁶¹ At one end of the spectrum some tribunals have referred to a ‘duty to contribute to the harmonious development of investment law and thereby to meet the legitimate expectations of the community of States and investors towards legal certainty and the rule of law’.⁶² In *Glamis Gold* the Tribunal although beginning by noting

⁵⁶ See eg ICSID Convention, Art 42(1)-(2), and preamble, recitals 2-4; US Model BIT (2012), preamble, recital 4.

⁵⁷ See eg *Glamis Gold Ltd v United States of America (Award)* (UNCITRAL (NAFTA) 8 June 2009) [3], [7].

⁵⁸ See eg Christoph Schreuer, ‘Investment Arbitration’ in Cesare PR Romano, Karen J Alter and Yuval Shany (eds), *The Oxford Handbook of International Adjudication* (OUP 2014) 296–8.

⁵⁹ See eg Stephan W Schill, ‘System-Building in Investment Treaty Arbitration and Lawmaking’ (2011) 12 *German LJ* 1083.

⁶⁰ See Stephan W Schill and Katrine R Tvede, ‘Mainstreaming Investment Treaty Jurisprudence: The Contribution of Investment Treaty Tribunals to the Consolidation and Development of General International Law’ (2015) 14 *LPICT* 94.

⁶¹ *Mesa Power Group, LLC v Canada (Award)* (PCA Case No. 2012-17, 24 March 2016) [222].

⁶² *Ibid*; *Saipem S.p.A v The People’s Republic of Bangladesh (Decision on Jurisdiction and Provisional Measures)* (ICSID Case No. ARB/05/07, 21 March 2007) [67].

its ‘case specific mandate’, stated that this was ‘not license to ignore systemic implications’ which required ‘sensitivity to the position of future tribunals and awareness of other systemic implications’.⁶³ Tellingly, even tribunals which have stressed that their role is to resolve the dispute before them rather than ‘to ensure the coherence or development of “arbitral jurisprudence”’ have not denied that their awards may have implications for future disputes.⁶⁴

There is also strong support for investment treaty tribunals having a wider ‘regime support’ function. As noted above, investment treaties typically have the object and purpose of promoting the economic development of the treaty parties, with investment protection provided for as a means to this ultimate goal.⁶⁵ Providing for an effective means of dispute settlement between foreign investors and host states should be understood in light of this wider goal. The statements by certain investment tribunals, noted above, that they have a duty to ‘meet the legitimate expectations of the community of States and investors towards certainty of the rule of law’, clearly envisage a regime support function.⁶⁶ Similarly, in *Glamis Gold* the Tribunal noted that it was operating within the context of ‘a significant public system of private investment protection’ established by Chapter 11 of NAFTA, and given the NAFTA States Parties had ‘made an indefinite commitment to the deepening of their economic relations’ it was important to maintain ‘governmental and public faith in the integrity of the process of arbitration’ by providing detailed reasons for its Award.⁶⁷ The Award in *Bilcon v Canada* also provides strong evidence that investment treaty tribunals see themselves as contributing to the wider investment regime. The majority, after controversially holding that Canada’s environmental review process, as applied, breached several investment protection standards, noted that it wished ‘to make several points very clear’ given ‘substantial concern among the public and state authorities that investor-state treaty provisions not be used as obstacles to the maintenance and implementation of high standards of

⁶³ *Glamis* (n 57) [3], [6]. Generally [3]-[9].

⁶⁴ *Romak S.A. (Switzerland) v The Republic of Uzbekistan (Award)*, (PCA Case No. AA280, 26 November 2009) [171].

⁶⁵ See above n 29.

⁶⁶ *Mesa* (n 61) [222]; Similarly: *Saipem* (n 62) [67].

⁶⁷ *Glamis* (n 70) [5], [8].

[environmental] protection'.⁶⁸ The majority emphasised that Canada, as a NAFTA State Party, could choose whatever standard of environmental protection it wished,⁶⁹ and that while encouraging investment was an express objective of NAFTA it was necessary for the Tribunal to 'avoid "regulatory chill"'.⁷⁰ The key point is that in all these examples tribunals see themselves as contributing, by deciding disputes, to the wider operation of the investment regime.

Investment treaty tribunals also play an important role in controlling state conduct which is subject to international disciplines imposed by investment treaties.⁷¹ As a significant body of scholarship has highlighted, key features of investment treaty arbitration, including that there is typically no requirement to exhaust local remedies, and that covered investors can directly challenge the sovereign acts of states, mean that it is arguably most analogous to administrative review at the domestic level or at the international level, for example through WTO adjudication or regional human rights adjudication.⁷² In the absence of investment treaty arbitration, many of the disputes analysed in this chapter that would be decided through the host state's judicial and administrative processes. The role of investment treaty arbitration in this regard potentially goes beyond the particular dispute being decided: arguably, investment treaty tribunals, through issuing awards that are often publicly available and closely followed by a wider professional audience, are also contributing to developing more generalised standards for state conduct, which may be picked up by other actors, including states, for example in adjusting their internal processes if they are concerned about future litigation risk.⁷³ In short, investment treaty arbitration is a striking example of international

⁶⁸ *William Ralph Clayton, William Richard Clayton, Douglas Clayton, Daniel Clayton and Bilcon of Delaware, Inc v Canada (Award on Jurisdiction and Liability)* (PCA Case No. 2009-04, 17 March 2015) [595].

⁶⁹ *Ibid* [598], [738].

⁷⁰ *Ibid* [737].

⁷¹ Regarding this role of international tribunals generally see above Ch I, text at n 103-106.

⁷² See eg Van Harten and Loughlin (n 3) 146, 149; Ortino (n 29) 438, 443-5; Stephan W Schill, 'International Investment Law and Comparative Public Law—an Introduction' in Stephan W Schill (ed), *International Investment Law and Comparative Public Law* (OUP 2010) 17.

⁷³ Benedict Kingsbury and Stephan Schill, 'Investor-State Arbitration as Governance: Fair and Equitable Treatment, Proportionality and the Emerging Global Administrative Law' in Albert Jan van den Berg (ed), *50 Years of the New York Convention* (Kluwer Law International 2009) 5-6, 23-26; Ortino (n 29) 438, 444-5; Schill, 'Introduction' (n 72) 23.

adjudication contributing to the development of international standards which control states' conduct, specifically in relation to foreign investors.⁷⁴

B. Balancing Stability and Change in Investment Treaty Arbitration

This section analyses the function of investment treaty arbitrators in balancing the competing interests of stability and change when interpreting and applying relevant legal norms. It is useful to distinguish between two distinct ways in which investment treaty arbitrators balance the competing interests of stability and change. First, investment arbitrators play a role in *managing potential changes in international legal norms*, in a similar manner to how adjudicators in the other contexts studied also contribute, alongside other actors within a regime, to ongoing processes of law-development. I will demonstrate this aspect of the function performed by investment arbitrators by considering a line of cases that have raised the question of whether the minimum standard of treatment owed to foreign investors has evolved over time. While this is far from the only area where adjudicators have contributed to development of relevant norms of investment protection, it is perhaps the clearest example of the first sense in which arbitrators, alongside other law-developing actors, contribute to processes of change in international legal norms. Secondly, however, investment arbitrators also play an important role in deciding on the permissible balance between the competing interests of stability and change *within the host state's legal and regulatory system* by applying standards of investment treaty protection in particular disputes. I will develop this aspect of the argument by considering how investment arbitrators have applied the two most prominent standards of investment protection, the guarantee of fair and equitable treatment (FET), and the guarantee against indirect expropriation without compensation, in environmental cases.

This distinction between the two different senses in which investment arbitrators balance the competing interests of stability and change broadly maps on to the distinction between interpretation and application, as recognised within treaty interpretation debates, drawn throughout this thesis.⁷⁵ The role of investment arbitrators in deciding on potential

⁷⁴ Van Harten and Loughlin (n 3) 149 ('investment arbitration would appear to be the only case of global administrative law in the world today').

⁷⁵ See above Ch I, text at n 87. Strictly the distinction between interpretation and application does not apply to customary international law because unlike treaties, there are not separate principles for its interpretation beyond the criteria for its existence. Nonetheless, in interpreting the meaning of a treaty norm it may be

changes in relevant norms of investment protection, alongside other law-developing actors, essentially concerns questions of interpretation, or determining the legal content and meaning of relevant norms at a general level. In contrast, the role of investment arbitrators in balancing stability and change within the host state's regulatory system largely concerns questions of application, or determining the consequences which the relevant norm of investment protection, whatever its content, attaches to the occurrence of particular facts in a dispute.⁷⁶ Nevertheless, the two senses in which investment arbitrators balance stability and change are interrelated because different interpretations of the content of the relevant standard of investment protection will lead to different views on the degree of stability an investor can expect within the host state's regulatory system in a particular case.

The above distinction helps us understand how investment arbitration is simultaneously quite similar to the other contexts studied regarding the role of adjudicators in contributing to wider processes of law-development, and different regarding the overriding focus of adjudication in this context on determining the permissible degree of change in the host state's regulatory system. The distinction brings greater analytical clarity to understanding the role of investment arbitrators in balancing the competing interests of stability and change whereas existing discussions have largely conflated the (admittedly interrelated) questions of change in international legal norms and change in a host state's regulatory environment.⁷⁷ Importantly, the relative influence of arbitrators at the two levels differs. On questions concerning the interpretation, or meaning in general, of investment protection norms states are actively clarifying controversial points of law via treaty drafting,⁷⁸ and providing for committees, constituted by the treaty parties,

necessary to have regard to customary norms, for example where the meaning of the former is tied to the latter: Anastasios Gourgourinis, 'The Distinction between Interpretation and Application of Norms in International Adjudication' (2011) 2 JIDS 31, 36.

⁷⁶ Regarding the concept of application see above Ch I, text at n 87.

⁷⁷ Thomas M Franck, *Fairness in International Law and Institutions* (OUP 1998) 438–442 (mainly focusing on an investor's interest in stability and a host state's interest in change, but recognising the discourse could concern general norms rather than being dispute-specific); Roland Kläger, 'Fair and Equitable Treatment' in *International Investment Law* (CUP 2011) 148–153 (investor's interest in stability as subject to balancing both given the host state's sovereignty and given investment norms need to be understood alongside other international norms with different objectives).

⁷⁸ See generally: Caroline Henckels, 'Protecting Regulatory Autonomy through Greater Precision in Investment Treaties: The TPP, CETA, and TTIP' (2016) 19 JIEL 27; UNCTAD, 'Taking Stock of IIA Reform' (n 9); Kathryn Gordon and Joachim Pohl, 'Investment Treaties over Time - Treaty Practice and Interpretation in a Changing World' (OECD Working Papers on International Investment 2015/02).

empowered to adopt interpretations which bind adjudicators,⁷⁹ as part of broader efforts to reshape this regime. Accordingly, the relative influence of arbitrators in contributing to processes of change in international legal norms in this regime will likely decline in future. In contrast, investment treaties largely do not enable the treaty parties themselves to decide on the application of relevant standards of protection to particular disputes with investors.⁸⁰ Thus, so long as investors continue to be given access to arbitration, investment arbitrators are likely to continue to play a key role in deciding upon the application of treaty standards to particular, fact-intensive disputes and, consequently, the permissible degree of change within host states' regulatory systems.

Of course, host states still retain the primary role of deciding upon and implementing their chosen regulatory system. What investment law does is to make that system, where it affects protected investors, subject to international standards contained in an investment treaty.⁸¹ Investment tribunals, by applying those standards in particular disputes, exercise a form of international control over the permissible degree of change within the host state's regulatory system. While tribunals cannot prevent regulatory changes at the domestic level – their decisions not having direct effect – they can, by finding violations and awarding compensation, make adopting certain forms of regulatory change prohibitively expensive.

⁷⁹ See eg CETA, Art 8.31(3), 8.44 (3)(a); TPP, Art 27.2 (2)(f); For a list of the many other recent investment treaties which include such a provision see Gordon and Pohl (n 78) 29.

⁸⁰ There are limited circumstances in which investment treaties do enable the treaty parties, if they agree, to jointly determine the treaty's application to a particular claim. Many recent investment treaties contain mechanisms which allow the taxation or financial authorities of the treaty parties a period in which to consult and express a joint view on taxation or prudential measures which are the subject of a claim by an investor. If a joint determination is made, the investor is typically either barred from bringing a claim or from relying on certain treaty provisions, or the determination binds tribunals: see Gordon and Pohl, *ibid* 29–31; This mechanism has been significantly broadened in the China-Australia Free Trade Agreement [2015] ATS 15. The treaty provides that 'measures of a Party that are non-discriminatory and for the legitimate public welfare objectives of public health, safety, the environment, public morals or public order shall not be the subject of a claim' by an investor: Art 9.11.4. If a respondent state receives a request for consultations from an investor which the state believes is a claim covered by Article 9.11.4, it can issue a notice which triggers a 90-day consultation period with the other treaty party: Art 9.11.5-6. If the treaty parties agree that the measure concerned is one covered by the exception in Article 9.11.4, their decision binds a tribunal: Art 9.18(3).

⁸¹ Franck (n 77) 446–7.

1. *Managing Change in International Legal Norms: The Case of the International Minimum Standard*

The role of investment arbitrators in deciding upon potential evolution of the minimum standard of treatment owed to investors provides clear evidence of the role of tribunals, alongside other law-developing actors in this regime, in managing potential changes in international legal norms.⁸² This issue has been particularly prominent in NAFTA arbitration because the NAFTA States Parties, through a binding subsequent agreement in 2001, tied the ‘minimum standard of treatment’ contained in NAFTA Article 1105(1) to the minimum standard of treatment owed to aliens under customary international law, and clarified that the references within the provision to ‘fair and equitable treatment’ and ‘full protection and security’ ‘do not require treatment in addition to or beyond that which is required by the customary’ minimum standard.⁸³ This clarification has subsequently been included in other treaties⁸⁴ and non-NAFTA tribunals have also taken positions on whether the customary minimum standard has evolved over time,⁸⁵ and the broader issue of how the conclusion of some 3000 investment treaties has affected customary international law.⁸⁶

Not all the awards discussed in this subsection are environmental cases because it is important to consider the key authorities concerning the evolution of the international minimum standard, which are repeatedly invoked by tribunals hearing environmental disputes when faced this question.⁸⁷ The historical content of the customary international minimum standard, the evolution of which is debated, is widely equated with a statement by the US-Mexico Claims Commission in the *Neer* case, requiring, for breach of the standard, that the relevant conduct ‘amount to an outrage, to bad faith, to wilful neglect

⁸² Another recent discussion which also frames this issue in these terms is W Michael Reisman, ‘Canute Confronts the Tide: States versus Tribunals and the Evolution of the Minimum Standard in Customary International Law’ (2015) 30 ICSID Review 616.

⁸³ NAFTA Free Trade Commission, Notes of Interpretation of Certain Chapter 11 Provisions (31 July 2001), [B(1)-(2)].

⁸⁴ See eg US Model BIT (2012), Art 5(2); Canada Model BIT (2004), Art 5(2).

⁸⁵ See eg the following cases all holding the standard had evolved: *Crystallex International Corporation v Bolivarian Republic of Venezuela (Award)* (ICSID Case No. ARB/AF/11/2, 4 April 2016) [530]-[534]; *Azurix Corp v Argentine Republic (Award)* (ICSID Case No. ARB/01/12, 14 July 2006) [365], [372]; *LG&E Energy Corp et al v Argentine Republic (Decision on Liability)* (ICSID Case No. ARB/02/1, 3 October 2006) [123] fn 29.

⁸⁶ See eg *Eureko BV v Republic of Poland (Partial Award)* (19 August 2005) [258]; See generally regarding both issues Martins Paparinskis, *The International Minimum Standard and Fair and Equitable Treatment* (OUP 2013).

⁸⁷ *Bilcon* (n 68) [433]-[435]; *Mesa* (n 61) [495]-[500].

of duty, or to an insufficiency of governmental action so far short of international standards that every reasonable and impartial man would readily recognize its insufficiency'.⁸⁸ In contemporary awards, two competing approaches to this issue have emerged, one which claims much more change in the relevant international legal norm, and the other which emphasises continuity in the norm although recognising that it now applies to a wider range of factual situations.

A representative example of the first, more evolutionary approach is the *Mondev* Award, where the Tribunal noted that '*Neer* and like arbitral awards were decided in the 1920s, when the status of the individual in international law, and the international protection of foreign investments, were far less developed'.⁸⁹ The Tribunal, observing the 'vast number of bilateral and regional investment treaties' providing for fair and equitable treatment and full protection and security, held that:

such a body of concordant practice will necessarily have influenced the content of rules governing the treatment of foreign investment in current international law. It would be surprising if this practice and the vast number of provisions it reflects were to be interpreted as meaning no more than the *Neer* Tribunal (in a very different context) meant in 1927.⁹⁰

Thus while the NAFTA parties' subsequent agreement in 2001 had resolved that the standard of treatment owed under Article 1105 was to be determined by customary international law,⁹¹ the effect had been to 'incorporate current international law'.⁹² Approving of this approach, the *ADF* Tribunal noted that:

what customary international law projects is not a static photograph of the minimum standard of treatment of aliens as it stood in 1927 when the Award in the *Neer* case was rendered. For both customary international law and the minimum standard of treatment of aliens it incorporates, are constantly in a process of development.⁹³

⁸⁸ *L.F.H. Neer and Pauline E. Neer v Mexico*, US-Mexico Claims Commission, Opinion of Commissioners, 15 October 1926, in AJIL 21 (1927) 555, 556 [4].

⁸⁹ *Mondev International Ltd v USA (Award)* (ICSID Case No. ARB[AF]/99/2, 11 October 2002) [116].

⁹⁰ *Ibid* [117].

⁹¹ *Ibid* [120-122].

⁹² *Ibid* [125].

⁹³ *ADF Group Inc v United States of America (Award)* (ICSID Case No. ARB[AF]/00/1, 9 January 2003) [179]; Similarly: *Waste Management, Inc v United Mexican States (Award)* (ICSID Case No. ARB[AF]/00/3, 30 April 2004) [91]-[93].

The Award in *Merill & Ring Forestry* makes a particularly bold claim concerning the evolution of the international minimum standard. Commenting that ‘[n]o legal system could endure in stagnation’,⁹⁴ the Tribunal distinguished between a ‘first track of the evolution’ of the international minimum standard, represented by older claims commission awards such as *Neer*, which concerned ‘personal safety, denial of justice and due process’, and ‘a second track’ concerning ‘the treatment of aliens in relation to business, trade and investment ... which was much more liberal’ and whose evolution had ‘yet not stopped’.⁹⁵ This led to the sweeping conclusion that the FET standard, which the NAFTA state parties had sought to curtail by tying it to the customary minimum standard, had itself become custom, and the modern, broader minimum standard ‘protects against all such acts or behavior that might infringe a sense of fairness, equity and reasonableness’.⁹⁶

A markedly different view as to how this area of international law may have (not) evolved was taken in the *Cargill* Award. Rightly emphasising that the issue, given the NAFTA parties’ joint interpretation tying the treaty standard to customary international law, was not one of treaty interpretation but one of establishing a change in custom, the Tribunal reasoned that:

proof of change in a custom is not an easy matter to establish. However, the burden of doing so falls clearly on Claimant. If Claimant does not provide the Tribunal with the proof of such evolution, it is not the place of the Tribunal to assume this task. Rather the Tribunal, in such an instance, should hold that Claimant fails to establish the particular standard asserted.⁹⁷

While accepting that the customary minimum standard was now being applied to a wider range of situations, the Tribunal emphasised that ‘the required severity of the conduct’ must be maintained.⁹⁸ Accordingly, for a state to breach the applicable standard, its behaviour towards the investor would have to amount to ‘gross misconduct, manifest injustice ... bad faith or the wilful neglect of duty, whatever the particular context’.⁹⁹ Clearly this interpretation favours the interest of stability and certainty in the content of

⁹⁴ *Merrill & Ring Forestry LP v Canada (Award)* (NAFTA (ICSID) 31 March 2010) [193].

⁹⁵ *Ibid* [201], [204]–[205], [207]; Similarly: *Bilcon* (n 68) [433]–[435].

⁹⁶ *Merrill & Ring* (n 94) [210]–[213]; For criticism see Patrick Dumberry, *The Fair and Equitable Treatment Standard: A Guide to NAFTA Case Law on Article 1105* (Kluwer Law International 2013) 115–6.

⁹⁷ *Cargill, Inc v United Mexican States* (ICSID Case No. ARB[AF]/05/Z, 18 September 2009) [271]–[273].

⁹⁸ *Ibid* [284].

⁹⁹ *Ibid* [286].

the minimum standard of treatment owed by host states. Similarly, in *Glamis Gold*, the Tribunal found that the customary minimum standard itself had not evolved, and while it was being applied to ‘more varied and complicated’ situations, ‘the level of scrutiny is the same’.¹⁰⁰

The key point for this thesis is that these cases are a stark example of investment arbitrators managing potential change in international legal norms, alongside other actors in this regime. To a greater degree than in the other settings studied, this role of investment arbitrators is shared with other actors because states have actively used treaty drafting, and subsequent agreement amongst the treaty parties, to clarify the meaning of relevant legal norms and bind future tribunals. This has been possible because the regime is largely constructed through bilateral agreements which are relatively easy to alter, unlike major multilateral treaties such as the WTO Agreements or UNCLOS where it is much harder to achieve agreement amongst the treaty parties. However, the underlying functional question reflects a broader challenge facing international adjudicators. While adjudicators are often asked to give weight to new developments in international law by claimants, they also need to provide sufficient legal certainty for the states bound by a norm, for example by requiring that a claimed evolution in custom, relevant to the meaning of a treaty term, is actually proved. In that respect, some of the above interpretations have rightly been criticised as not sufficiently demonstrating the claimed evolution in customary law.¹⁰¹

2. *The Function of Investment Treaty Arbitrators in Balancing Stability and Change within the Host State’s Regulatory System*

There is a second sense in which investment arbitrators engage in balancing stability and change which is more particular to this context and explains a great deal about the role performed by adjudicators in this regime. Investment arbitrators, in applying relevant standards of investment protection to particular disputes, also determine the permissible balance between the investor’s interest in stability of the regulatory system affecting its investment and the host state’s interest in being able to adjust regulation to meet new circumstances. I will develop this argument by analysing, in turn, cases where investment

¹⁰⁰ See *Glamis* (n 57) [612]-[616].

¹⁰¹ Dumberry (n 96) 108 (arguing that NAFTA tribunals, after the treaty parties’ joint interpretation, have simply “moved the goal post”); Schill, *Multilateralization* (n 26) 274–5.

arbitrators have had to determine whether purportedly environmental regulations breach the prominent investment treaty standards of FET and the protection against indirect expropriation.¹⁰² There are different approaches within the case law regarding the interpretation of these legal norms and the degree of stability they require in a host state's regulatory system as an abstract matter. However, much of what is being debated in these cases concerns the application of such standards to the particular, fact-intensive disputes that tribunals determine. The role of investment treaty arbitrators in balancing the competing interests of stability and change within the host state's regulatory system is important because states frequently need to adjust regulation to meet new demands, including in relation to newly appreciated environmental risks, and such measures are liable to be challenged before investment treaty tribunals.¹⁰³ Even 'new style' treaty provisions which have been drafted to increase states' room to adjust regulation largely depend upon how they are applied to concrete disputes by arbitrators.¹⁰⁴

a) Stability and Change, Fair and Equitable Treatment, and Environmental Regulation
Cases where investment arbitrators have faced the question of whether environmental regulation violates the FET standard provide strong support for my argument that investment arbitrators decide upon the degree of certainty and stability investors are entitled to within the host state's regulatory system, and the host state's ability to adjust regulation given changing circumstances. It is widely recognised that one element of the FET standard is a degree of stability and predictability in the legal and business environment of the host state.¹⁰⁵ However, there is a difference in the stringency of the standards developed by tribunals. Some tribunals have posited stability as an end in itself and set an impossibly high standard for host state conduct, whereas other tribunals have tied the degree of stability that can be expected to the objectively justified legitimate

¹⁰² Other less-commonly invoked investment treaty standards can raise the issue of the permissible degree of change within the host state's regulatory environment. For example, most investment treaties contain a guarantee of 'full protection and security'. While some tribunals have interpreted this as limited to ensuring the physical security of investments, others have interpreted it as including the idea of ensuring stability of the legal and commercial environment. See Ralph Alexander Lorz, 'Protection and Security (Including the NAFTA Approach)' in Marc Bungenberg et al (eds), *International Investment Law: A Handbook* (Hart Publishing 2015) 783–9; *Crystallex* (n 85) [624]–[635].

¹⁰³ Gus Van Harten, 'Investment Rules and the Denial of Change' (2010) 60 UTLJ 893, 903; Gus Van Harten, 'Foreign Investor Protection and Climate Action: A New Price Tag for Urgent Policies' [2015] Osgoode Legal Studies Research Paper <http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2697555>.

¹⁰⁴ See below n 155.

¹⁰⁵ *Duke Energy Electroquil Partners & Electroquil SA v Republic of Ecuador (Award)* (ICSID Case No. ARB/04/19, 18 August 2008) [339]; *LG&E* (n 85) [124]–[125]; *CMS Gas Transmission Co v Argentine Republic (Award)* (ICSID Case No. ARB/01/8, 12 May 2005) [276].

expectations of the investor, upon investing, given the conditions prevailing in the host state and in particular any specific assurances given to the investor.¹⁰⁶

An example of the first type of approach is the stringent standard formulated in the *Tecmed* case, where Mexico was found to have violated the FET standard by failing to provide clarity regarding the regulatory conditions affecting the investor's hazardous waste operation, including by refusing to renew the operating permit for reasons extraneous to the stated environmental reasons.¹⁰⁷ The Tribunal stated that:

The foreign investor expects the host State to act in a consistent manner, free from ambiguity and totally transparently in its relations with the foreign investor, so that it may know beforehand any and all rules and regulations that will govern its investments, as well as the goals of the relevant policies and administrative practices or directives, to be able to plan its investment and comply with such regulations. ... The foreign investor also expects the host State to act consistently, i.e. without arbitrarily revoking any preexisting decisions or permits issued by the State that were relied upon by the investor to assume its commitments as well as to plan and launch its commercial and business activities.¹⁰⁸

A similar expectation of state behaviour was enunciated by the *Metalclad* Tribunal, another case where Mexico was held liable for failing to ensure a predictable regulatory framework for an investor that was found to have invested on the understanding it had met all the legal requirements for the development of a hazardous waste facility, which was subsequently not permitted on environmental grounds.¹⁰⁹ In a move which led to its Award being partially set aside in the Canadian courts, the Tribunal interpreted the FET obligation owed by Mexico in light of the NAFTA's preamble's reference to 'transparency',¹¹⁰ holding that:

¹⁰⁶ Similarly: Jorge E Viñuales, *Foreign Investment and the Environment in International Law* (CUP 2012) 350–52; Jonathan Bonnitcha, *Substantive Protection under Investment Treaties: A Legal and Economic Analysis* (CUP 2014) 167–194 (developing a four-fold taxonomy of approaches to legitimate expectations, and highlighting the difference between approaches which allow investors to have expectations about the stability of general regulation and approaches which only allow investors to rely on specific assurances).

¹⁰⁷ *Técnicas Medioambientales Tecmed SA v United Mexican States (Award)* (ICSID Case No. ARB(AF)/00/2, 29 May 2003) [162]–[172].

¹⁰⁸ *Ibid* [154].

¹⁰⁹ *Metalclad Corporation v United Mexican States (Award)* (ICSID Case No. ARB(AF)/97/1, 30 August 2000) [99], generally [77]–[99].

¹¹⁰ See *United Mexican States v Metalclad* [2001] BCSC 664, [66]–[76], [133]–[136].

all relevant legal requirements for the purpose of initiating, completing and successfully operating investments made, or intended to be made, under the Agreement should be capable of being readily known to all affected investors of another Party. There should be no room for doubt or uncertainty on such matters.¹¹¹

These particularly broad formulations have been convincingly criticised in later arbitral awards.¹¹² There is a strong argument that such formulations reflect an unrealistic standard of ‘perfect public regulation in a perfect world’, which few states are ever likely to attain.¹¹³ Obviously, if such a broad interpretation of the FET standard is endorsed it has the potential to preclude the updating of environmental regulation to reflect ‘advances in scientific knowledge or shifts in social values’.¹¹⁴ My point in highlighting these awards is that they represent one extreme within the role that arbitrators play, in applying the FET standard in environmental cases, of deciding upon the permissible degree of change in the host state’s regulatory system.

In contrast, the formulation of the FET standard which has tended to prevail in later cases has been more tightly circumscribed and includes consideration of whether the claimant reasonably relied on representations made by the host state when making its investment.¹¹⁵ This reflects that tribunals have become more sensitive to host states’ need ‘to maintain a reasonable degree of regulatory flexibility ... in order to respond to changing circumstances in the public interest’.¹¹⁶ Several tribunals have accepted that in determining whether an investor’s expectations relied on in making an investment were reasonable it is necessary to consider ‘not only the facts surrounding the investment, but also the political, socioeconomic, cultural and historical conditions prevailing in the host State’.¹¹⁷ In the *Bilcon* case, although the majority held that on the facts Canada had

¹¹¹ *Metalclad* (n 109) [76].

¹¹² See eg *Biwater Gauff (Tanzania) Ltd v United Republic of Tanzania (Award)* (ICSID case No. ARB/05/22, 24 July 2008) [600]; *MTD Equity Sdn Bhd & MTD Chile SA v The Republic of Chile (Decision on Annulment)* (ICSID Case No. ARB/01/7, 21 March 2007) [66]-[71].

¹¹³ Zachary Douglas, ‘Nothing if Not Critical for Investment Treaty Arbitration: Occidental, Eureko and Methanex’ (2006) 22 *Arb Int* 27, 28.

¹¹⁴ Kate Miles, *The Origins of International Investment Law: Empire, Environment and the Safeguarding of Capital* (CUP 2013) 169.

¹¹⁵ See especially *Waste Management* (n 93) [98]; This formulation has been approved by numerous later tribunals: eg *Biwater* (n 112) [597], [599]. *Bilcon* (n 68) [442]-[444].

¹¹⁶ *Joseph Charles Lemire v Ukraine (Decision on Jurisdiction and Liability)* (ICSID Case No. ARB/06/18, 14 January 2010) [500].

¹¹⁷ *Duke Energy* (n 105) [340]; *Mamidoil Jetoil Greek Petroleum Products Societe SA v Republic of Albania (Award)* (ICSID Case No. ARB/11/24, 30 March 2015) [625]-[629].

breached the FET standard through the failure of an environmental review body to apply its mandate,¹¹⁸ the Tribunal stressed that ordinarily ‘state authorities with the power to change law or policy must have reasonable freedom to proceed’, and such freedom was only restricted in special circumstances, such as where regulatory changes were contrary to prior specific assurances given to the investor.¹¹⁹ Similarly, in the recent *Philip Morris v Uruguay* Award, concerning tobacco-control measures enacted on public health grounds, the Tribunal noted that ‘the requirements of legitimate expectations and legal stability as manifestations of the FET standard do not affect the State’s rights to exercise its sovereign authority to legislate and to adapt its legal system to changing circumstances’.¹²⁰ Legitimate expectations could only arise from ‘*specific* undertakings and representations made by the host state to induce investors to make an investment’. Accordingly: ‘Provisions of *general* legislation applicable to a ... category of persons do not create legitimate expectations that there will be no change in the law.’¹²¹

Several investment awards with an environmental component indicate how the second, more circumscribed approach, might be applied so as to strike a different balance between an investor’s preference for certainty and stability in the regulatory system affecting its investment, and a host state’s interest in being able to adjust regulation as circumstances change. For example, in the recent *Mesa Power* Award, where an investor challenged Canada’s administration of a tender process for renewable energy, the Tribunal, in holding that Canada had not breached NAFTA’s FET standard, emphasised that this standard ‘does not provide a guarantee against regulatory change. A State may amend its laws and regulations as it deems appropriate in light of changing circumstances.’¹²² This was particularly true, according to the majority, given that the Feed-In-Tariff (FIT) program, for which the investor was bidding, was expressly subject to change.¹²³ In contrast, Judge Brower, although agreeing with the majority on the relevant legal standard, namely that a state can enact ‘an acceptable range of potential [regulatory]

¹¹⁸ *Bilcon* (n 68) [573].

¹¹⁹ *Ibid* [572].

¹²⁰ *Philip Morris Brands Sàrl, Philip Morris Products SA and Abal Hermanos SA v Oriental Republic of Uruguay (Award)* (ICSID Case No. ARB/10/7, 8 July 2016) [422]. See also [423] (discussing “‘the acceptable margin of change’”).

¹²¹ *Ibid* [426]. See also [429]–[430]; For similar reasoning in an environmental case see *Copper Mesa Mining Corporation v Republic of Ecuador (Award)* (PCA Case No. 2012-2, 15 March 2016) [6.61]–[6.62].

¹²² *Mesa* (n 61) [619].

¹²³ *Ibid* [619]–[620].

change’, held that Canada’s conduct, in engaging in a parallel negotiation process, outside the FIT program, ‘effectively stood the FIT program on its head’ and breached the FET standard.¹²⁴ This is an excellent example of arbitrators balancing the competing interests of stability and change within the host state’s regulatory system, and agreeing on the content of the relevant legal norm in the abstract but nevertheless disagreeing, when applying that standard to the facts, as to whether host state’s changes to regulation were permissible.

A more realistic approach to the permissible degree of change in the host state’s regulatory system is also evident in the *Plama v Bulgaria* Award, where the investor argued Bulgaria had breached the FET standard by amending its environmental law, so as to retrospectively render the investor liable for environmental damage caused by an oil refinery it had acquired.¹²⁵ The Tribunal emphasised that Bulgaria had not given the investor a promise to freeze its environmental legislation,¹²⁶ and the investor could not have been sure upon investing, given the state of domestic law, that it would avoid liability.¹²⁷ Similarly, in *Glamis Gold*, the Tribunal highlighted several factors in justifying why there had been ‘no unsettling of reasonable, investment-backed expectation[s]’.¹²⁸ These included that the investor had not been given specific commitments to induce its investment, nor any guarantee of regulatory approval, and it was ‘operating in a climate that was becoming more and more sensitive to the environmental consequences of open-pit mining’.¹²⁹

Of course, the above cases are distinct from instances where an investor has received specific assurances from the host state as to the future regulatory system affecting its investment.¹³⁰ Nevertheless, they provide strong evidence that investment arbitrators, in applying the FET standard, are balancing the degree of certainty or stability an investor can expect against the right of the host state to adapt regulation in the course of managing

¹²⁴ Ibid, Conc. and Diss. Op. Brower [4], [17], [22]-[23].

¹²⁵ *Plama Consortium v Bulgaria (Award)* (ICSID Case No. ARB/03/24, 27 August 2008) [149].

¹²⁶ Ibid [219].

¹²⁷ Ibid [221]; For a similar case emphasising that that an investor must anticipate that the host state’s regulatory system could change unless specific assurances were given to the contrary see *Parkerings-Compagniet AS v Republic of Lithuania (Award)* (ICSID Arbitration Case No. ARB/05/8, 11 September 2007) [330]-[333], [338].

¹²⁸ *Glamis* (n 57) [766].

¹²⁹ Ibid [767].

¹³⁰ As had occurred in *Metalclad* discussed above n 109.

public affairs. Indeed, in the recent case of *Mamidoil v Albania*, where the investor challenged the host state's closure of a port, partly on environmental grounds, the Tribunal, in applying the FET standard, repeatedly referred to the need to allow states to adjust policy to changing 'economic, social, environmental and legal circumstances and problems' while nevertheless protecting investors from 'inacceptable and inappropriate changes of conditions and circumstances by the State'.¹³¹ In short, in applying the FET standard, arbitrators determine the permissible degree of change in the aspects of the host state's regulatory system which affect protected investments.

b) Balancing Stability and Change in the Host State's Regulatory System:

Environmental Measures as an Indirect Expropriation

My argument that investment arbitrators decide upon the permissible balance between investors' interest in stability and certainty in regulation, and host states' interest in being able to adapt regulation to new circumstances, is further supported by cases which concern the application of the protection against indirect expropriation to purportedly environmental measures. By way of context, it is standard to distinguish between direct expropriations, where there is a formal transfer to title to the host state, and indirect expropriations, where there is no such transfer but the effects of the measure substantially deprive the investor of the benefits and value of the investment, or of its control, management, and operation.¹³² Direct expropriations are today relatively rare, and the limited case law concerns whether the environmental purpose of a measure is relevant in determining the amount of compensation to be paid.¹³³ It is within case law concerning whether environmental measures constitute an indirect expropriation that the function of

¹³¹ *Mamidoil (Award)* (n 117) [617], [634]. Generally [613]-[662], [695]-[734]; See also *Copper Mesa* (n 121) [6.81] (FET standard involving balancing of 'the legitimate interests of the foreign investor with the legitimate interests of the host State and others, including (especially) its own citizens and local residents'); *Saluka Investments BV (The Netherlands) v Czech Republic (Award)* (UNCITRAL, 17 March 2006) [305]-[306].

¹³² Dolzer and Schreuer (n 22) 101-4; *Compañía Del Desarrollo De Santa Elena, SA v Republic of Costa Rica (Final Award)* (ICSID Case No. ARB/96/1, 17 February 2000) [76]-[77]; A further distinction can be drawn between targeted measures which are specific to an investor, and measures of general effect: Viñuales (n 106) 294-5; General measures are less likely to constitute an expropriation, including because tribunals typically recognise the principle that public interest regulation should not constitute an expropriation, and the impact on an investment is typically less grave: see eg *SD Myers, Inc v Canada (Partial Award)* (UNCITRAL (NAFTA) 13 November 2000) [281]-[282].

¹³³ A well-known case involving a direct expropriation where the tribunal concluded that the environmental purpose of the measure did not affect the amount of compensation is *Santa Elena* (n 132) [71] fn 32; An alternative approach, which would reduce investor certainty regarding the future value of investments but be more sensitive to the regulatory interests involved, would take environmental considerations into account in assessing compensation, such as whether a market had a limited life-span given social understandings of risk: Viñuales (n 106) 128-9.

arbitrators in deciding on the permissible degree of change in host state regulation is starkest.

One approach to this issue, the ‘sole-effects’ doctrine, provides a high degree of investor certainty but seriously impedes states’ ability to adjust regulation. Under this approach, the focus, in terms of whether an indirect expropriation has occurred, is solely on the effects of the state measure on the investment and the purpose of the measure, environmental or otherwise, is irrelevant.¹³⁴ A good example of such an approach is the *Metalclad* case, already mentioned above, in which provincial Mexican authorities denied a permit for the operation of a hazardous waste facility and subsequently declared an ecological preserve which prevented the operation of the facility indefinitely.¹³⁵ The Tribunal’s analysis of whether an expropriation had occurred focused entirely on the effects of the relevant measures on the investment, and did not consider the ‘motivation or intent’ behind the adoption of the ecological decree, despite the authorities having denied the permit partly on the basis of concerns about the environmental impact of the project.¹³⁶ Another example is provided by *Unglaube v Costa Rica*, which concerned a domestic process initiated by Costa Rica to expropriate part of the investor’s property to establish a national park. The Tribunal, while emphasising the ecological importance of the area Costa Rica was seeking to protect, which was home to an endangered turtle species,¹³⁷ nevertheless found an indirect expropriation had occurred, focusing its analysis entirely on the effects of the relevant measures on the claimant’s property.¹³⁸ The sole effects approach ensures a high degree of investor certainty – a compensable expropriation will be held to have occurred whenever the effects on the investment are sufficiently grave – but seriously impedes the host state’s ability to adjust regulation, including as new environmental risks become known, by ignoring the purpose for which state measures are taken.

¹³⁴ Rudolf Dolzer, ‘Indirect Expropriations: New Developments?’ (2002) 11 NYU Envtl LJ 64, 79, 86–90. Henckels (n 29) 76; Bonnitcho (n 106) 241–3.

¹³⁵ *Metalclad* (n 109) [106], [109].

¹³⁶ See *ibid* [92], [106]–[107], [109]–[111].

¹³⁷ *Marion Unglaube and Reinhard Unglaube v Republic of Costa Rica (Award)* (ICSID Case Nos. ARB/08/1, ARB/09/20, 16 May 2012) [37], [210].

¹³⁸ See *ibid* [209]–[223].

A second approach removes a certain class of legitimate regulatory conduct from the definition of an indirect expropriation via the doctrine of the state's 'police powers',¹³⁹ even where it causes a substantial deprivation of property, and thus strikes a markedly different balance between the interests of the investor in regulatory certainty and the host state in being able to adapt regulation. This approach was applied in the *Methanex* case, where California's ban on a gasoline additive on environmental and public health grounds was found not to constitute an expropriation,¹⁴⁰ with the Tribunal holding:

as a matter of general international law, a non-discriminatory regulation for a public purpose, which is enacted in accordance with due process and, which affects, inter alios, a foreign investor or investment is not deemed expropriatory and compensable unless specific commitments had been given by the regulating government ...¹⁴¹

A similar approach was applied by the *Chemtura* Tribunal in holding that Canada's cancellation of the investor's authorisation to sell lindane-based products was a valid exercise of its police powers, and did not constitute an expropriation, given that the measures were within the mandate of the regulator, non-discriminatory, and 'motivated by the increasing awareness of the dangers presented by lindane for human health and the environment'.¹⁴² Several other recent awards with an environmental component have also endorsed the police powers doctrine but held that it was not satisfied on the facts.¹⁴³ Most recently the Tribunal in *Philip Morris v Uruguay* affirmed the approach of the above awards, whereby the police powers doctrine constitutes an exception under general international law to the guarantee against indirect expropriation, even where the relevant investment treaty does not explicitly recognise such an exception.¹⁴⁴

¹³⁹ The term 'police powers' refers to a government's general power to regulate in the public interest. Although emanating in American law, it has made its way into investment law discourse: see Dolzer and Schreuer (n 22) 120; Viñuales (n 106) 367–9; David Schneiderman, *Constitutionalizing Economic Globalization: Investment Rules and Democracy's Promise* (CUP 2008) ch 2.

¹⁴⁰ *Methanex Corporation v USA (Final Award)* (UNCITRAL (NAFTA) 3 August 2005), pt IV, ch D [7]; Note that the Tribunal also held that the investor had not proved that the requisite deprivation of property for an expropriation had occurred: [16].

¹⁴¹ *Ibid* pt iv ch D [7]; See outside the environmental context *Saluka* (n 131) [262].

¹⁴² *Chemtura Corporation (formerly Crompton Corporation) v Canada (Award)* (UNCITRAL (NAFTA)) 2 August 2010) [266]; Note that the Tribunal found that there was no substantial deprivation of the claimant's investment as lindane-based products were a relatively small part of its business: [263]–[265].

¹⁴³ *Copper Mesa* (n 121) [6.60]–[6.72]; *Quiborax SA and Non Metallic Minerals SA v Plurinational State of Bolivia (Award)* (ICSID Case No. ARB/06/2, 16 September 2015) [202]–[226]; *Burlington Resources Inc v Republic of Ecuador (Decision on Liability)* (ICSID Case No. ARB/08/5, 14 December 2012) [506]–[529].

¹⁴⁴ *Philip Morris v Uruguay* (n 120) [290]–[301].

Under the ‘police powers’ approach investors’ rights are seen ‘as already constituted, bounded and periodically redefined by regulation’.¹⁴⁵ Thus, in *Methanex* the Tribunal emphasised that the investor had:

entered a political economy in which it was widely known, if not notorious, that governmental environmental and health protection institutions at the federal and state level, operating under the vigilant eyes of the media, interested corporations, non-governmental organizations and a politically active electorate, continuously monitored the use and impact of chemical compounds and commonly prohibited or restricted the use of some of those compounds for environmental and/or health reasons.¹⁴⁶

Plainly, this approach increases the potential for host states to adjust their regulation, for example as new risks become known, and reduces the level of certainty investors can have about the future regulatory system affecting their investment and thus its ongoing viability.

The suggestion that what tribunals are doing in these cases is balancing investors’ interest in certainty and stability and host states’ interest in being able to adjust regulation is supported by the intermediate position taken by some tribunals which have refused to exclude regulatory measures from the definition of an expropriation, and have held that the effects on an investment is the most important consideration, but accepted that the purpose of a measure is one factor to be taken into account.¹⁴⁷ For example, in the *Tecmed* case proportionality analysis, a classic balancing technique, was introduced in order to mediate between the public purpose pursued by the state’s measure and the impact on the investor’s rights.¹⁴⁸ In the recent *Philip Morris v Uruguay* Award, the Tribunal also noted certain conditions which state measures must satisfy to fall within the police powers exception, namely that they must be ‘taken *bona fide* for the purpose of protecting the public welfare, must be non-discriminatory and proportionate’.¹⁴⁹

¹⁴⁵ Thomas W Wälde and Abba Kolo, ‘Environmental Regulation, Investment Protection and “Regulatory Taking” in International Law’ (2001) 50 ICLQ 811, 823.

¹⁴⁶ *Methanex* (n 140) pt IV, ch D [9].

¹⁴⁷ See eg *Tecmed* (n 107) [116], [121]-[122]; *Azurix* (n 85) [310]-[312]; *LG&E* (n 85) [189]-[196].

¹⁴⁸ *Tecmed* (n 107) [122].

¹⁴⁹ *Philip Morris v Uruguay* (n 120) [305]. Note that while the introduction of proportionality balancing is controversial, it is uncontroversial that for a measure to be covered by the police powers exception it must be enacted in a non-discriminatory manner in accordance with due process: see the authorities cited above n 140-143.

The interventions of commentators also suggest that determining the permissible degree of change in the host state's regulatory system is central to these cases. For example, Jorge Viñuales, in arguing that general regulations should only exceptionally be taken to constitute an expropriation and that regulatory change may be justifiable even where specific assurances are given, emphasises that that 'regulatory change is not the exception but the rule, particularly when it comes to the highly regulated markets in which investors in the energy, mining, chemical and other similar sectors operate'.¹⁵⁰ In contrast, Saverio Di Benedetto argues that the police powers doctrine is a lopsided approach, which gives insufficient weight to the investor interests which are impaired by the regulatory changes involved.¹⁵¹ Arguably, the introduction of a proportionality requirement, as suggested by the *Philip Morris v Uruguay* Award, may reduce this concern, although, as we will see, proportionality balancing raises significant concerns given that tribunals may not be well placed to evaluate the relative importance of host state regulatory interests and affected investor interests.

Increasingly, states are addressing this issue in investment treaties in an effort to preserve maximum ability to adjust regulation in future, for example through provisions stating that except in rare circumstances, non-discriminatory regulatory measures that pursue legitimate public welfare objectives, such as protecting public health or the environment, do not constitute indirect expropriations,¹⁵² and by including general exceptions provisions based on Article XX of the GATT.¹⁵³ Clearly such treaty provisions clarify the legal standard to be applied by tribunals, and they may lead future tribunals to be more open to host state arguments for regulatory change.¹⁵⁴ However, such treaty-based reform will not eliminate the role of arbitrators in deciding upon the permissible degree of regulatory change within the host state because the standards remain highly fact-

¹⁵⁰ Viñuales (n 106) 306–7, 376.

¹⁵¹ Saverio Di Benedetto, *International Investment Law and the Environment* (Edward Elgar Publishing 2013) 127, 131–2; Similarly: Wälde and Kolo (n 145) 846.

¹⁵² US Model BIT (2012), Annex B, para 4(b); Canada Model BIT (2004), Annex B.13(1)(c); New Zealand-China FTA (2008), Annex 13, paras [4]–[5].

¹⁵³ See eg Agreement between the Government of Canada and the Government of the People's Republic of China for the Promotion and Reciprocal Protection of Investments (2012), Art 33; Some treaties also incorporate such provisions wholesale: eg New Zealand-China FTA (2008), Art 200; Regarding the different types of general exceptions clauses in investment agreements see Jürgen Kurtz, *The WTO and International Investment Law: Converging Systems* (CUP 2016) 193–227.

¹⁵⁴ See eg *Philip Morris v Uruguay* (n 120) [290], [300]–[301] (citing such developments in treaty drafting as evidence for the police powers doctrine being part of customary international law, and thus relevant for interpreting a treaty which did not explicitly contain a police powers exception).

dependent and arbitrators will still need to resolve controversial questions of application, such as whether ‘rare circumstances’ exist which mean that an environmental measure nevertheless constitutes an indirect expropriation.¹⁵⁵ As the above analysis has shown, in applying key standards of investment protection to particular disputes investment arbitrators perform an important role of balancing the competing interests of an investor in the stability of the regulatory system affecting its investment, and the host state in being able to adapt regulation given changing circumstances. This application function of investment arbitrators is central to the international control which investment treaties impose on changes in host states’ regulatory systems.

C. The Standard and Method of Review in Investment Treaty Arbitration

1. Standard of Review in Investment Treaty Arbitration

As in the other adjudication contexts studied, in investment treaty arbitration environmental cases frequently raise the functional problem of the appropriate intensity of adjudicatory review of domestic-level determinations which are based on specialist forms of expertise that arbitrators do not hold or involve the exercise of discretion by governmental authorities, including over value-laden matters.¹⁵⁶ A good starting point is provided by *Chemtura v Canada*, discussed above, which concerned Canada’s ban on lindane-based products which the investor produced. The Tribunal emphasised that the review involved in applying the international minimum standard was fact specific and it had to take ‘into account all the circumstances, including the fact that certain agencies manage highly specialized domains involving scientific and public policy determinations’.¹⁵⁷ The Tribunal rejected the idea of a general doctrine of deference: ‘This is not an abstract assessment circumscribed by a legal doctrine about the margin of appreciation of specialized regulatory agencies. It is an assessment that must be conducted *in concreto*’.¹⁵⁸ This reflects that the standard of review must be tailored to the particular

¹⁵⁵ Henckels (n 78) 42–3; Anthea Roberts, ‘Triangular Treaties: The Extent and Limits of Investment Treaty Rights’ (2015) 56 HILJ 353, 379 fn 68.

¹⁵⁶ In addition to the environmental cases discussed in this subsection, recent investment awards concerning public health measures have also made important contributions regarding the standard of review, emphasising the deference owed to domestic authorities charged with judging the need for such measures. See *Philip Morris v Uruguay* (n 120) [399], [418]–[419], and Conc. and Diss. Op. Born [181]–[191]; *Apotex Holdings Inc and Apotex Inc v United States of America (Award)* (ICSID Case No. ARB[AF]/12/1, 25 August 2014) [9.37], [9.39], [9.48].

¹⁵⁷ *Chemtura* (n 142) [123].

¹⁵⁸ *Ibid.*

circumstances of a case.¹⁵⁹ Nevertheless, in the approach applied, the Tribunal noted that it was ‘not its task to determine whether certain uses of lindane are dangerous, whether in general or in the Canadian context’.¹⁶⁰ The Tribunal emphasised that ‘lindane has raised increasingly serious concerns both in other countries and at the international level since the 1970s’, citing numerous examples of national and international regulation.¹⁶¹ Despite the existence of some divergence of views within the Canadian authorities the Tribunal was not convinced that the national regulatory process was conducted in bad faith,¹⁶² adding that it was not its role to ‘judge the correctness or adequacy of the scientific results’ relied upon.¹⁶³

A similar approach is evident in the *Methanex* Award concerning California’s ban on a methanol-based gasoline additive where the parties debated at length the merits of the scientific report on which the measure was based. The Tribunal, having considered the expert evidence, accepted the report relied on by California:

as reflecting a serious, objective and scientific approach to a complex problem in California. Whilst it is possible for other scientists and researchers to disagree in good faith with certain of its methodologies, analyses and conclusions, the fact of such disagreement, even if correct, does not warrant this Tribunal in treating the UC Report as part of a political sham by California. In particular, the UC Report was subjected at the time to public hearings, testimony and peer-review; and its emergence as a serious scientific work from such an open and informed debate is the best evidence that it was not the product of a political sham engineered by California ...¹⁶⁴

The Tribunal was ‘not persuaded that the UC Report was scientifically incorrect’, and this was based on its decision to accept without reservation the conclusions of the expert witnesses’ relied on by the United States and cross-examined by the investor.¹⁶⁵ Importantly, the Tribunal did not attempt to itself formulate a set of conclusions.

¹⁵⁹ Henckels (n 29) 190.

¹⁶⁰ *Chemtura* (n 142) [134].

¹⁶¹ *Ibid* [135]-[136].

¹⁶² *Ibid* [137]-[138], [143], [148].

¹⁶³ *Ibid* [153].

¹⁶⁴ *Methanex* (n 140) pt III, ch A [101].

¹⁶⁵ *Ibid*.

Glamis Gold is another important example regarding the standard of review. In this case, which concerned the regulatory process applied to the claimant's mining proposal in an area adjacent to sites of indigenous cultural significance, the United States, as respondent, argued that the Tribunal should afford deference to domestic administrative decisions, so as not to second-guess primary decision-makers. The Tribunal, although disagreeing 'that domestic deference in national court systems is necessarily applicable to international tribunals', found that deference was already present within the international minimum standard being applied.¹⁶⁶ Accordingly, while the parties had led extensive expert evidence in debating the merits of the cultural review process that had been part of the approval process for the investor's mine, the Tribunal accepted the United States' argument that "[i]t is simply not this Tribunal's task to become archaeologists and ethnographers", and further noted that '[i]t is not the role of this Tribunal, or any international tribunal, to supplant its own judgment of underlying factual material and support for that of a qualified domestic agency.'¹⁶⁷ Instead, the Tribunal's role was limited to assessing 'whether there was reasonable evidence, and thus the government's reliance on such was not obviously and actionably misplaced'.¹⁶⁸ Similarly, in relation to separate state-level legislation affecting the investor, the Tribunal found that the United States had *prima facie* shown that the measure 'was rationally related to its stated purpose and reasonably drafted to address its objectives'.¹⁶⁹ The fact that the measure did not address all potential harms did not make it impermissible, but merely reflected the normal role of government in compromising between conflicting interests.¹⁷⁰

In the recent *Bilcon* Award the majority of the Tribunal, in holding that the environmental review process applied to the claimant's project breached the international minimum standard, emphasised 'that it has not purported ... to conduct its own environmental assessment, in substitution for' the review that was undertaken by Canada. The majority held that liability arose because the investor was not 'afforded a fair opportunity' to have

¹⁶⁶ *Glamis* (n 57) [617], [624]-[627]; For criticism of deference based on the content of particular treatment standards, rather than on the basis of relative decision-making capacity see Gus Van Harten, *Sovereign Choices and Sovereign Constraints: Judicial Restraint in Investment Treaty Arbitration* (OUP 2013) 98-100.

¹⁶⁷ *Glamis* (n 57) [779]. See also [762] (regarding deference to domestic authorities' determinations of domestic law).

¹⁶⁸ *Ibid* [786], also [781], [783], [787].

¹⁶⁹ *Ibid* [803].

¹⁷⁰ *Ibid* [803]-[805]. Similarly [817].

its case assessed in accordance with the relevant domestic legal process. The majority stressed that it was ‘not here deciding what the actual outcome [of the review process] should have been, including what mitigation measures should have been prescribed’.¹⁷¹ Additionally, in emphasising the high threshold that had to be met for the international minimum standard to be breached the majority noted that it was necessary to ‘take into account that domestic authorities may have more familiarity with the factual and domestic legal complexities of a situation’, and that ‘domestic authorities may also enjoy distinctive kinds of legitimacy, such as being elected or accountable to elected authorities’.¹⁷² The majority further recognised that: ‘Modern regulatory and social welfare states tackle complex problems. ... The imprudent exercise of discretion or even outright mistakes do not, as a rule, lead to a breach of the international minimum standard.’¹⁷³

Given the majority formed a decisive view, in finding a breach of the international minimum standard, regarding how the domestic environmental review process should have operated under Canadian law, arguably the approach actually applied was quite intrusive.¹⁷⁴ Nevertheless, the statements highlighted are significant because they advance common reasons for avoiding de novo review of relevant decisions, also seen in other adjudication contexts, such as that domestic authorities may be more familiar with ‘the factual and domestic legal complexities of the situation’, and may be entitled to a degree of latitude in exercising discretion when dealing with complex social problems. Several other recent investment awards with an environmental component have also endorsed the idea that the host state is owed a significant, although not unlimited, degree of deference in adopting regulation and enforcing its laws,¹⁷⁵ for example given domestic authorities specialist expertise and proximity to relevant facts,¹⁷⁶ or their normal role in deciding

¹⁷¹ *Bilcon* (n 68) [602]-[603].

¹⁷² *Ibid* [439].

¹⁷³ *Ibid* [437].

¹⁷⁴ See further the Dissenting Opinion of Arbitrator McRae, who submitted that the majority had wrongly found a breach of the international minimum standard when at most what had been shown was a breach of national law that did not rise to that threshold. He suggested this represented a significant intrusion into domestic jurisdiction that would affect future environmental review processes: *ibid*, Diss. Op. McRae [34]-[51].

¹⁷⁵ *Adel A Hamadi Al Tamimi v Sultanate of Oman (Award)* (ICSID Case No. ARB/11/33, 3 November 2015) [387]-[390], [444]-[445], [458] (provisions in the applicable Free Trade Agreement demonstrated the importance the treaty parties attached to being able to enforce their environmental laws, and widened the deference owed to the host state); See earlier *SD Myers* (n 132) [261], [263], and Sep. Op. Schwartz [230], [233].

¹⁷⁶ *Crystallex* (n 85) [583]-[585].

between various possible policy aims and the means to pursue them.¹⁷⁷ Overall, we see investment arbitrators avoiding full de novo review of the type of determinations that lie at the heart of sensitive environmental disputes but exercising a more confined degree of international scrutiny which has a crucial influence over what counts as an acceptable domestic regulatory process.

2. Methods of Review in Investment Treaty Arbitration

a) Least Restrictive Means Testing in Investment Treaty Arbitration

In several of the environmental cases reviewed investment arbitrators have employed a form of necessity or least restrictive means testing in scrutinising whether state measures purportedly pursuing legitimate regulatory aims violated investment treaty obligations. A good example is the *SD Myers* case which concerned a Canadian measure, pursuant to the country's international environmental obligations, which temporarily banned the cross-border movement of certain types of hazardous waste. The Tribunal, in undertaking a wide-ranging analysis of the relevant trade, investment, and environmental obligations, repeatedly emphasised that to the extent that the measure had a legitimate environmental objective – in preserving a domestic hazardous waste disposal industry – this could have been achieved by other less NAFTA-inconsistent alternative measures that were available.¹⁷⁸ The Tribunal found that Canada's measure operated to favour Canadian nationals over non-nationals, was enacted with protectionist intent,¹⁷⁹ and thus breached the national treatment and FET obligations.¹⁸⁰ The key principle applied by the Tribunal was that 'where a state can achieve its chosen level of environmental protection through a variety of equally effective and reasonable means, it is obliged to adopt the alternative that is most consistent with open trade'.¹⁸¹

The cross-cutting nature of necessity or least restrictive means testing as a method of review was further developed by Arbitrator Schwartz, who noted:

In both trade treaties and environmental treaties, a general approach is taken to reconciling the promotion of trade with the protection of the environment. Governments have the unrestricted right to their environmental objectives. They can

¹⁷⁷ *Mesa* (n 61) [632]. Also [579], [583], [587], [682].

¹⁷⁸ *SD Myers* (n 132) [215], [221], [255], [297].

¹⁷⁹ *Ibid* [193]-[194].

¹⁸⁰ *Ibid* [256], [268].

¹⁸¹ *Ibid* [221].

aim as high as they like. In pursuing those standards, however, governments should avoid measures that are discriminatory. Governments should also avoid measures that restrict trade more than is reasonably necessary in order to achieve the objectives they have freely chosen.¹⁸²

Thus, Arbitrator Schwartz suggested that although the NAFTA investment national treatment obligation does not contain an equivalent to the GATT Article XX exceptions, it could require a similar analysis to Article XX cases. For example, analysis of whether an investor was in ‘like circumstances’ to nationals could depend on whether discriminatory treatment was justified by a legitimate policy objective and could not be accomplished by less trade-restrictive means.¹⁸³ The idea that least restrictive means testing could be used to justify an otherwise non-discriminatory measure pursuing a legitimate domestic policy aim, even if there was ‘an incidental and reasonably unavoidable burden on foreign enterprises’, was also endorsed in the *Bilcon* case.¹⁸⁴

Another prominent example of arbitrators employing necessity testing is the *Suez, Interagua v Argentina* and *Suez, Vivendi v Argentina* cases which concerned disputes between Argentina and concessionaires charged with supplying water and sewage services around the time of the country’s financial crisis. In justifying why Argentina had breached the FET obligation, these Tribunals noted that there was ‘strong evidence’ that alternative measures were available that would have protected both the public interest Argentina sought to pursue in safeguarding the water supply, and the investor’s interests. The Tribunals noted that if Argentina wished to avoid an increase in consumer tariffs during the crisis it might have relieved the concessionaire of some of its commitments, which ‘were placing a crippling burden on the Concession so long as tariffs did not increase’, or have allowed tariff increases and provided government subsidies for the poor.¹⁸⁵ In these cases, Argentina invoked the customary international law defence of necessity, contending that it was acting to secure the public supply of water and was thus

¹⁸² Ibid, Sep. Op. Schwartz [93].

¹⁸³ Ibid [129].

¹⁸⁴ *Bilcon* (n 68) [721]- [724].

¹⁸⁵ *Suez, Sociedad General de Aguas de Barcelona SA, and InterAgua Servicios Integrales del Agua SA v The Argentine Republic (Decision on Liability)* (ICSID Case No. ARB/03/17, 30 July 2010) [215]; *Suez, Sociedad General de Aguas de Barcelona SA, and Vivendi Universal SA v The Argentine Republic and AWG Group v The Argentine Republic (Decision on Liability)* (ICSID Case No. ARB/03/19, 30 July 2010) [235].

owed a wide margin of appreciation.¹⁸⁶ The Tribunals, while accepting that an essential interest of state was at issue, held that Argentina's chosen measures were not the only way Argentina could satisfy that interest, referring to the alternative measures that would, in the Tribunals' view, have safeguarded the supply of water and also protected the investor's rights.¹⁸⁷

With the possible exception of necessity as a defence within the law of state responsibility,¹⁸⁸ it is problematic that these Tribunals did not more explicitly address why the alternative measures available were reasonably available to Argentina in a crisis situation, for example in terms of its ability to design such measures or to compensate the investor.¹⁸⁹ We have seen, for example, that WTO adjudicators have repeatedly emphasised that any proposed alternative measures must be reasonably available, and numerous ITLOS judges have also criticised strict approaches to necessity.¹⁹⁰ A more deferential approach was articulated by Arbitrator Nikken in separate opinions in both disputes, who emphasised that it was not for the Tribunal to retrospectively determine what alternative measures were available to Argentina in responding to a crisis situation.¹⁹¹ Accordingly, he found that the freezing of consumer tariffs during the emergency situation was within the range of acceptable measures open to Argentina, however Argentina's indefinite maintenance of the measures, which severely affected the concessionaire, meant that the FET standard was breached from the moment when normalisation of the concession relationship was possible.¹⁹²

b) Full Proportionality Review in Investment Treaty Arbitration

In several of the investment awards with an environmental component reviewed arbitrators engaged in full proportionality review and explicitly weighed the relative importance of the regulatory interest being pursued by the host state measure against the harm caused to the investor's interests. In *Tecmed*, which concerned the non-renewal of

¹⁸⁶ *Suez InterAgua* (n 185) [232]. *Suez Vivendi* (n 185) [252].

¹⁸⁷ *Suez InterAgua* (n 185) [238], [240]. *Suez Vivendi* (n 185) [260], [262].

¹⁸⁸ Recall that as noted in Chapter Five because necessity within the law of state responsibility is a defence only available in exceptional circumstances, the existence of any alternative means of safeguarding the essential interest concerned will defeat the defence, and the cost of alternative measures is irrelevant: see above Ch V, text at 159.

¹⁸⁹ Henckels (n 29) 106 (noting, however, that it is unclear whether this was argued by Argentina).

¹⁹⁰ See above Ch IIIC(2), Ch IV(C).

¹⁹¹ *Suez InterAgua* (n 185) Sep. Op. Nikken [37]. See also [34]-[36], [42].

¹⁹² *Ibid* [43]-[44].

an operating permit for a hazardous waste facility, purportedly on the basis of certain violations of the permit conditions by the operator, the Tribunal stated that it would consider, in order to determine whether the host state's regulatory actions were expropriatory, 'whether such actions or measures are proportional to the public interest presumably protected thereby and to the protection legally granted to investments'.¹⁹³ The Tribunal recognised that 'the analysis starts at the due deference owing to the State when defining the issues that affect its public policy or the interests of society as a whole, as well as the actions that will be implemented to protect such values'. However, this did not prevent it from examining 'whether such measures are reasonable with respect to their goals, the deprivation of economic rights and the legitimate expectations of [those] who suffered such deprivation.'¹⁹⁴ Importantly, the Tribunal required that 'there must be a reasonable relationship of proportionality between the charge or weight imposed to the foreign investor and the aim sought to be realized by any expropriatory measure'.¹⁹⁵

The Tribunal's application of this test involved balancing the relative importance of the interests at stake. For example, the Tribunal, having determined that non-renewal of the permit was motivated by public opposition to the urban location of the landfill, not the operation of the landfill itself, recognised it would have to weigh the interest that the measure was pursuing, in responding to such public concern, against the impact on the investor's rights.¹⁹⁶ The Tribunal proceeded to find that the opposition to the location of the landfill was not massive, and did not justify the measure, which completely neutralised the investment without compensation.¹⁹⁷ The key point is that the international tribunal has itself engaged in weighing the relative importance of the interests being pursued by the host state measure against the impact on the investor's interests. In contrast if the method of review was limited to least restrictive means testing the international tribunal would not second-guess the relative importance of the goal being pursued by the regulating state or the level of protection selected, and would only ask whether there was an alternative, reasonably available means of securing that interest that was less restrictive of the investor's interests.

¹⁹³ *Tecmed* (n 107) [122].

¹⁹⁴ *Ibid* [122]; Approved in *Azurix* (n 85) [311]-[312].

¹⁹⁵ *Tecmed* (n 107) [122]; See also the use of proportionality in applying the police powers exception and the FET standard in *Philip Morris v Uruguay* (n 120) [305]-[306], [409]-[410].

¹⁹⁶ *Tecmed* (n 107) [132]-[133].

¹⁹⁷ *Ibid* [144], [147]-[149] (also reasoning that there was no evidence that the investor's operations had actually endangered the environment or public health, despite minor infringements).

Another stark example of investment arbitrators engaging in full proportionality review is *Occidental v Ecuador*,¹⁹⁸ which concerned a penalty imposed on the investor, in the form of having its oil exploration contract terminated, after the investor, in contravention of Ecuador's hydrocarbons law, assigned some of its exploration rights without approval from the authorities. In other words, as the Tribunal recognised, the case concerned Ecuador's rights as sovereign over its own natural resources, including deciding which parties would be given permission to exploit those resources.¹⁹⁹ The context for the Tribunal's lengthy analysis of the proportionality of the penalty was that Ecuadorian law itself included a requirement that administrative discretion be exercised proportionately.²⁰⁰ However, this case is of much wider relevance because the Tribunal held that the principle of proportionality was 'applicable as a matter of general international law',²⁰¹ and thus Ecuador's penalty, being disproportionate, breached customary international law, as well as the treaty standards of FET, treatment according to the international minimum standard, and the guarantee against indirect expropriation.²⁰²

Significantly, the Tribunal held that it had to assess the proportionality of Ecuador's conduct even if it found no meaningful alternatives were available to it.²⁰³ Thus, in addition to identifying three alternatives that were available to Ecuador,²⁰⁴ the Tribunal explicitly weighed the relative importance of the regulatory goal pursued by the state against the investor's interests. The Tribunal found that the penalty imposed on the investor – which in effect constituted total loss of an investment worth hundreds of millions of dollars – was disproportionate to its alleged wrongdoing and to 'the importance and effectiveness of the "deterrence message" which the Respondent [Ecuador] might have wished to send the wider oil and gas community'.²⁰⁵ Again, as a method of review this is quite exceptional, with international adjudicators explicitly

¹⁹⁸ *Occidental Petroleum Corporation and Occidental Exploration and Production Company v The Republic of Ecuador (Award)* (ICSID Case No. ARB/06/11, 5 October 2012); The Award was subject to a partially successful application for annulment, however the Tribunal's application of the proportionality principle was upheld: see (Decision on Annulment of the Award, 2 November 2015) [343]-[351].

¹⁹⁹ *Occidental (Award)*, *ibid* [446].

²⁰⁰ See *ibid* [424]-[425].

²⁰¹ *Ibid* [427], [402]-[404].

²⁰² *Ibid* [452]; For another endorsement of proportionality in explaining why a host state's conduct – in effectively preventing an investor from completing an Environmental Impact Assessment necessary to pursue its mining project – breached the FET standard see *Copper Mesa* (n 121) [6.84].

²⁰³ *Occidental*, *ibid* [426]-[427].

²⁰⁴ *Ibid* [434], generally [428]-[436].

²⁰⁵ *Ibid* [450].

engaging in evaluating the relative importance of the regulatory goals pursued by a state against investor interests, and, for example, taking into account whether the state's interests, as sovereign over its natural resources, were actually harmed by the investor's misconduct.²⁰⁶

D. The Contribution of Investment Arbitration to Broader Processes of Dispute Resolution

This section suggests that in terms of the contribution of adjudicators' pronouncements to broader processes of dispute resolution investment arbitration differs in an important respect from the other adjudication contexts studied. In the investment context it is much harder to find examples of arbitrators acting in a facilitative manner and helping the parties to manage their relationship going forward, for example by providing guidance on the legal framework for their future interactions. Instead, adjudication in this context largely functions as a backwards-looking compensation mechanism.²⁰⁷

Several features of investment treaty arbitration help explain why there is less evidence in this context of a prospectively oriented and facilitative style of adjudication. First, in investment arbitration, in contrast to the interstate contexts studied, it is much more common that by the time of a decision on the merits the disputing parties no longer have an ongoing relationship. Instead, in many, but not all, disputes the investor will have left the host state and be seeking to recover part of its losses.²⁰⁸ However, there are exceptions, and this factor alone does not fully explain the finding of difference. There is evidence that some investors do negotiate with host states after arbitration, for example in the context of long-term investments, such as in infrastructure or mining, and when an investor has other investments and thus a broader relationship with the host state.²⁰⁹ Yet

²⁰⁶ See *ibid* [445]-[447].

²⁰⁷ Similarly: Benedikt Pirker, *Proportionality Analysis and Models of Judicial Review: A Theoretical and Comparative Study* (Europa Law Publishing 2013) 347; UNCTAD, 'Investor-State Disputes: Prevention and Alternatives to Arbitration' (UNCTAD Series on International Investment Policies for Development, 2010) xxiii (investor-state 'arbitration is focused entirely on the payment of compensation and not on maintaining a working relationship between the parties').

²⁰⁸ Pirker (n 207) 347; Christoph Schreuer, 'Non-Pecuniary Remedies in ICSID Arbitration' (2004) 20 *Arb Int* 325, 332.

²⁰⁹ Emilie M Hafner-Burton, Sergio Puig and David G Victor, 'Against International Settlement? Secrecy, Adjudication and the Transformation of International Law' (Arizona Legal Studies Discussion Paper No 16-33, August 2016) 35-36, 44-45, 47-55 <http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2720706>; A recent example is provided by *Gold Reserve Inc v Bolivarian Republic of Venezuela (Award)* (ICSID Case No. ARB(AF)/09/1, 22 September 2014). In February 2016 the disputing parties reached a settlement which involved Venezuela paying the

importantly, even where post-adjudication bargaining occurs in this regime, it does not occur under the supervision or guidance of adjudicators.²¹⁰

Other contextual features of investment treaty arbitration help further explain this difference. While tribunals under most investment treaties formally have the power to order a wide range of non-pecuniary remedies,²¹¹ in practice, unlike the other settings studied, compensation is nearly always the only remedy that is requested by claimants and awarded by tribunals.²¹² This preference of claimants reflects that under the ICSID Convention, the most commonly used procedural framework, only pecuniary obligations are subject to the powerful enforcement mechanism created,²¹³ and, given the multi-year length of investment arbitrations, a successful claimant will typically have lost their place in the relevant market.²¹⁴ The dominance of compensation also reflects that, unlike in the interstate settings studied, the claimants in this regime are generally driven solely by commercial motivations. Furthermore, states as both treaty drafters and as respondents in arbitrations have often resisted the idea that investment treaty tribunals can order non-pecuniary remedies, reflecting sovereignty-based concerns.²¹⁵ Even in the small number of awards where tribunals have contemplated the possibility of a future productive

liability found by the Award, and the parties agreeing to form a jointly owned company to further develop relevant mining projects. For the parties' announcements see: <<http://www.italaw.com/cases/2727>>.

²¹⁰ Ibid; Similarly: Michael E Schneider, 'Investment Disputes – Moving Beyond Arbitration' in Laurence Boisson de Chazournes, Marcelo G Kohen and Jorge E Viñuales (eds), *Diplomatic and Judicial Means of Dispute Settlement* (Martinus Nijhoff Publishers 2013) 140 (noting settlements largely occur through direct negotiations without the involvement of third parties).

²¹¹ See *Bernhard von Pezold et al v Republic of Zimbabwe (Award)* (ICSID Case No. ARB/10/15, 28 July 2015) [695]–[700]; Schreuer, 'Non-Pecuniary' (n 210) 331–2; Note, however, that some investment treaties limit the available remedies to monetary damages, or provide the option of paying monetary damages in lieu of other remedies: eg US model BIT (2012), Art 34(1); Energy Charter Treaty, Art 26(8); NAFTA, Art 1135(1), CETA, Art 8.39(1).

²¹² Pirker (n 208) 346–7; Geraldo Vidigal, 'Targeting Compliance: Prospective Remedies in International Law' (2015) 6 JIDS 462, 483; Schreuer, 'Non-Pecuniary' (n 208) 332; Demirkol highlights that while there is nothing which prevents the use of non-pecuniary remedies in investment treaty arbitration, such remedies are usually not practical, because they are typically not in the interests of investors and it is difficult to enforce non-pecuniary orders if the respondent state refuses to comply: Berk Demirkol, 'Remedies in Investment Treaty Arbitration' (2015) 6 JIDS 403; Regarding the relative novelty of the use of damages in investment arbitration see Van Harten and Loughlin (n 3) 131–33.

²¹³ ICSID Convention, Art 54(1); Anne Van Aaken, 'Primary and Secondary Remedies in International Investment Law and National State Liability: A Functional and Comparative View' in Schill (ed), *International Investment Law and Comparative Public Law* (n 72) 734; Schreuer, 'Non-Pecuniary' (n 208) 325–6.

²¹⁴ Demirkol (n 212) 411.

²¹⁵ See the treaty drafting choices mentioned above n 211; Regarding state attitudes as respondents see eg *Enron Corporation and Ponderosa Assets, LP v Argentine Republic (Decision on Jurisdiction)* (ICSID Case No. ARB/01/3, 14 January 2004) [76].

relationship between the disputing parties, they have almost always provided the host state or the investor the option of selecting compensation instead.²¹⁶

The prevailing paradigm in which investment arbitration occurs is also highly relevant. In a regime which has drawn its procedural rules and many of its participants from a commercial arbitration background, the idea that arbitrators would play a facilitative role, aimed at assisting the disputing parties' to resolve their dispute themselves, is controversial.²¹⁷ It is commonly assumed that the entire point of investment arbitration is to obtain an order for compensation,²¹⁸ which can be enforced in domestic courts. A purely negotiation-based regime is said to be inappropriate given the inferior bargaining power of a foreign investor which has already sunk its capital in a host state.²¹⁹

To the extent that investment treaties require negotiation between the disputing parties such provisions are directed at the period before arbitration is utilised. Although the requirement to exhaust local remedies generally does not apply in investor-state arbitration,²²⁰ investment treaties typically contain an obligation to initially seek to settle

²¹⁶ See eg *Antoine Goetz et al v Burundi (Award)* (ICSID Case No. ARB 95/3, 10 February 1999) [133], [135]-[137]. English translation in 6 ICSID Reports 3. (Tribunal gave the respondent state the option of paying compensation to the investor or reinstating the benefits of the free zone certificate which had been revoked within four months, with provision for a return to the Tribunal to fix the appropriate reparation if Burundi did not take one of these steps. Subsequently, the parties' reached a settlement by which their relationship was re-established: see 6 ICSID Reports 46ff); *Franck Charles Arif v Moldova (Award)* (ICSID Case No. ARB/11/23, 8 April 2013) [570] (Tribunal ordered restitution and compensation as alternative remedies, with the parties to negotiate but the investor having the option of accepting compensation. This was said to provide 'a final opportunity to preserve the investment, while also preserving Claimant's right to damages if a satisfactory restitutionary solution cannot be found': [571]-[572]); *Occidental Exploration and Production Company v Ecuador (Final Award)* (UNCITRAL, LCIA Case No. 3467, 1 July 2004) [213]-[214] (Tribunal offering disputes parties 'guidance' if they wished to explore rebalancing the contract concerned); In *CMS Gas v Argentina*, a dispute concerning emergency measures adopted by Argentina affecting a gas supplier, the Tribunal noted that while restoring the previous situation was unrealistic, the parties were free to negotiate to rebalance the contract in question: *CMS Gas* (n 105) [407]. However, the Tribunal was not willing to wait for the parties to reach such an agreement, which was uncertain, and accordingly ordered compensation: [408]; Contrast *von Pezold* (n 211) [727]-[744], [1020] (Tribunal ordered Zimbabwe to reinstate claimants' title to expropriated properties).

²¹⁷ Brooks E Allen, 'The Use of Non-Pecuniary Remedies in WTO Dispute Settlement: Lessons for Arbitral Practitioners' in Michael E Schneider and Joachim Knoll (eds), *Performance as a Remedy: Non-Monetary Relief in International Arbitration* (Juris 2011) 298; On commercial arbitration as one dominant influence on investment arbitration see Anthea Roberts, 'Clash of Paradigms: Actors and Analogies Shaping the Investment Treaty System' (2013) 107 AJIL 45; Schill, 'Introduction' (n 72).

²¹⁸ Christoph Schreuer, 'Alternative Remedies in Investment Arbitration' (2016) 3 JDIA 1, 1.

²¹⁹ W Michael Reisman, 'International Investment Arbitration and ADR: Married but Best Living Apart' (2009) 24 ICSID Review 185, 190-1; Sergio Puig, 'No Right Without a Remedy: Foundations of Investor-State Arbitration' (2014) 35 U Pa J Int'l L 829, 841-48.

²²⁰ Under Article 26 of the ICSID Convention, the default position is that consent to ICSID arbitration excludes local remedies, although states can explicitly require exhaustion of local remedies as a condition of their consent; Such clauses are rare: Dolzer and Schreuer (n 22) 265.

any disputes amicably, however, importantly, these are time limited and foresee the later submission of a claim to arbitration if the dispute cannot be settled amicably within a specific period.²²¹ Some investment treaties also require that a claimant investor must initially submit their claim to the host state's domestic courts or administrative review procedures for a fixed period of time, before they can access international arbitration.²²² In practice, given the substantial resources involved in fully pursuing an investment treaty claim, and the potential impact on an ongoing relationship with the host state, an aggrieved investor will often have pursued any possibility of reaching a negotiated solution with the host state prior to a claim being determined on the merits.

All of these contextual factors help explain why investment arbitration has a predominantly retrospective focus, aimed at assessing liability and awarding compensation, and we do not see adjudication in this context having a partly prospective focus aimed at assisting the parties to rebuild their relationship.

E. Conclusion

This chapter has analysed the three selected problems facing adjudicators in relation to investment treaty arbitration in a manner that is sensitive to the numerous contextual features which shape this adjudication mechanism. The largely retrospective focus of adjudication in this setting represents a significant finding of difference with the other contexts studied where there are clearer signs of adjudication at times providing guidance to assist the parties' future interactions and the potential rebuilding of their relationship after adjudication. As the contextual features of this regime which help explain this finding have been considered above, this section focuses on explaining the other findings of similarity and difference emerging from this chapter. Through such a constructive approach we can develop a clearer understanding of the particularities of investment treaty arbitration, given the context within which it occurs, and what the practices reviewed suggest about key challenges and legal techniques of wider relevance beyond this regime.

²²¹ See eg New Zealand-China FTA (2008), Arts 152-153(1); US Model BIT (2012), Arts 23-24; CETA, Arts 9.18, 9.19(1).

²²² Eg New Zealand-China FTA (2008), Art 153(2); See further Christoph Schreuer, 'Calvo's Grandchildren: The Return of Local Remedies in Investment Arbitration' (2005) 4 LPICT 1, 3-4; Van Aaken (n 213) 739-41.

Investment treaty arbitrators, in addition to contributing to processes of change in relevant international legal norms alongside other law-developing actors within this regime – like adjudicators in the other contexts studied – also decide upon the permissible degree of change in the host state’s regulatory system. This distinction provides a sharper understanding of the two quite different, although partly interrelated, ways in which investment arbitrators balance the competing interests of stability and change. It also helps explain how investment arbitrators’ influence on the development of legal norms in this regime appears set to decline, given significant treaty-based reform by states, and yet arbitrators’ role in applying treaty standards to concrete disputes, and deciding on the permissible degree of domestic regulatory change, is likely to remain prominent so long as this adjudication mechanism exists.²²³ Institutional features of this regime help explain this finding. States have been able to exercise a prominent role, alongside adjudicators, in shaping the meaning of international legal norms in this regime because it is largely bilaterally constructed. Thus it is easier to change than major multilateral structures, such as the WTO, where negotiations are stalled given the difficulty of reaching agreement amongst a large number of treaty parties. While relevant norms of investment protection in early BITs tended to be drafted at a high level of generality, states have been able to use later treaty drafting, and subsequent agreement amongst the treaty parties, to counter interpretations they disagree with and influence the development of the law. The decision of states to utilise ad hoc tribunals, and avoid creating any permanent tribunal or appellate mechanism, is also highly relevant to the substantial control states have retained over the development of legal norms in this regime.²²⁴ However, in relation to the large number of investment treaties which continue to provide investors access to international arbitration, adjudicators dominate the application of treaty norms to particular disputes. Accordingly, states do not fully control what treaty norms will require of their regulatory systems in

²²³ A similar distinction between the relative inability of investment arbitrators to modify the law as a general matter, despite their independence in applying treaty norms to particular cases, is drawn by Eyal Benvenisti and George W Downs, ‘Prospects for the Increased Independence of International Tribunals’ (2011) 12 German LJ 1057, 1064, 1068.

²²⁴ Santiago Montt, *State Liability in Investment Treaty Arbitration: Global Constitutional and Administrative Law in the BIT Generation* (Hart Publishing 2009) 156-159; In 2004 the ICSID Secretariat raised the idea of an Appeals Facility and this was abandoned after consultations were conducted with stakeholders. Some US investment treaties contemplate future negotiations to create an appellate mechanism but such negotiations do not appear to have occurred: Barton Legum, ‘Options to Establish an Appellate Mechanism for Investment Disputes’ in Karl P Sauvant (ed), *Appeals Mechanism in International Investment Disputes* (OUP 2008) 231–234; See, however, the recent developments discussed above, text at n 10-11.

particular disputes, even where those norms are drafted with significant precision.²²⁵ Arguably it is this authoritative application role, in the context of fact-intensive disputes, which is the distinct contribution of adjudicators in this regime.

The goals or *telos* of this regime also help explain why we see investment arbitrators performing the role of determining the permissible balance between an investor's interest in stability of the regulatory system applying to its investment and a host state's interest in being able to adjust regulation. Although stability is generally not an explicit aim of investment treaties,²²⁶ it is clear that the BIT regime was designed to exercise a degree of control over public decision-making in developing, capital-importing states, as a means of attracting foreign investment flows and ultimately promoting the economic development of the treaty parties.²²⁷ Consistent with this aim, the substantive norms within this regime cut deeply into the domestic regulatory system of host states, and have a wide, rather than subject-specific, reach. In short, an important part of the bias at play in this regime is a bias against change within the host state's regulatory system.²²⁸ This bias has not been constant. For example, in relation to the key treaty standard of FET, it was shown that while early arbitral awards required an unrealistically high standard of stability, which few states would ever meet, more recent awards have strongly endorsed the host state's right to adjust regulation, subject only to specific assurances given to the investor and relied on in making the investment. This interpretive shift likely reflects how lopsided the initial interpretations were, and the need to address criticisms of the regime, such as that it unreasonably constrains the ability of governments to adapt regulation to new demands.²²⁹ In future the driving *telos* of investment treaties may shift again, from promoting the economic prosperity of the treaty parties to a more complicated goal of sustainable development, including as arbitrators respond to treaty-based reform and widespread legitimacy concerns directed at this regime.²³⁰

²²⁵ See above n 80.

²²⁶ Jonathan Bonnitcha, 'Investment Treaties and Transition from Authoritarian Rule' (2014) 15 JWIT 965, 966–968.

²²⁷ Ortino (n 29) 441–44; Jeswald W Salacuse and Nicholas P Sullivan, 'Do Bits Really Work: An Evaluation of Bilateral Investment Treaties and Their Grand Bargain' (2005) 46 HILJ 67, 77; Kenneth J Vandeveld, *Bilateral Investment Treaties: History, Policy, and Interpretation* (OUP 2010) 3–4.

²²⁸ Similarly: Schneiderman (n 139) 8, 37, 236; Van Harten, 'Denial of Change' (n 103).

²²⁹ For such criticisms see *ibid*.

²³⁰ For argument that the *telos* of investment treaties is shifting in this direction, based on recent treaty drafting trends and an evolutionary interpretation of earlier treaty preambles see Federico Ortino, 'Investment Treaties, Sustainable Development and Reasonableness Review: A Case Against Strict Proportionality Balancing' (TLI Think! Paper 14/2016) 8–17 <<http://ssrn.com/abstract=2603193>>.

Clearly, international norms in other regimes also cut deeply into certain areas of domestic decision-making where protected foreign interests are affected. The norms governing non-tariff barriers to trade contained in the SPS and TBT agreements, considered in the WTO context, and the UNCLOS norms governing coastal states' exercise of their law-enforcement powers in the EEZ, are two examples. In those contexts too part of the rationale for providing for compulsory jurisdiction is to make the disciplines on domestic decision-making more readily enforceable through international adjudication. Yet in none of the other contexts studied did the cooperative regime concerned, and the case law generated by its adjudication mechanism, have the same overriding focus on controlling the permissible degree of change in the respondent state's regulatory system.

Investment arbitrators' practices regarding the standard or intensity of adjudicatory review bear important similarities to the manner in which the issue arose and was responded to by adjudicators in the other settings studied, although certain contextual features of this regime clearly shape the relevant practices. In this setting the relevant treaty texts did not rely on scientific determinations in the same way as provisions of the SPS Agreement, considered in the WTO context, however investment tribunals nevertheless repeatedly faced similar fact-intensive determinations based on specialised expertise. This reflected that the domestic regulatory processes affecting an investor often partly depended upon determinations based on scientific or technical expertise. In evaluating whether the regulatory process applied by the host state complied with standards of investment protection arbitrators were accordingly faced with disagreements about the risks of certain activities that are common in environmental cases in all of the settings studied. Given only investors bring claims in this setting, it was always the investor, as claimant, seeking to fault the host state's decision-making process, for example by showing that it was not scientifically well-founded or was contrary to the administrative processes applied in equivalent cases. Investment arbitrators explicitly refrained from full *de novo* review of certain determinations of host states, for example those concerning risk, often emphasising that they did not hold the specialist forms of expertise which had been relied on by national-level decision-makers. Like other international adjudicators, investment arbitrators are non-specialists in relation to the scientific and technical determinations that often lie at the heart of environmental disputes.

Nevertheless, host states' determinations were, in a similar manner to other adjudication contexts, subjected to a more confined degree of adjudicatory scrutiny. Tribunals had the benefit of competing expert evidence advanced by the investor, although several of them noted that mere disagreement between the investor's experts and the host state's experts was not sufficient reason to fault the domestic process. Arbitrators sought to scrutinise the decision-making process employed by states, considering for example whether the relevant process involved peer review or followed international standards, and afforded affected interests, including investors, a hearing. As with similar forms of process-based scrutiny applied in the other contexts arbitrators' decisions will inform future understandings of what will count as an acceptable domestic regulatory process.

Another reason arbitrators advanced for avoiding full *de novo* review of certain determinations was that domestic-level decision-makers were better placed to balance competing interests, given their greater legitimacy, and greater familiarity with relevant local facts. Many of the disputes in which the standard of review was a prominent issue raised acute legitimacy questions about the appropriate allocation of decision-making authority between the national and international levels in deciding upon environmental or human health risks and competing commercial interests of investors. Investment arbitrators were clearly aware of how controversial it would be for them to second-guess the determinations of domestic authorities, and this concern was reflected in the significant deference afforded to host states in many of the cases and the broader remarks supporting deference in international adjudication. While legitimacy concerns are at present strongest in relation to investment arbitration, and were apparent in some of the statements of arbitrators seeking to address such concerns, they are not specific to this context. On the contrary, such concerns were often apparent in the other contexts studied when adjudicators were asked to scrutinise sensitive domestic determinations regarding risk. The observation by several investment tribunals that modern regulatory states frequently exercise discretion and compromise between numerous conflicting interests, and accordingly should not be too easily second-guessed by international tribunals, is a point relevant beyond this context.

The type of international obligations investment treaty arbitrators adjudicate over, namely investment protection obligations owed by host states to investors, clearly shaped how certain methods of review arose within this adjudication setting. Tribunals variously

utilised either least restrictive means testing or full proportionality review in the course of determining whether state measures which pursued a protected non-investment interest nevertheless violated the national treatment, FET, or indirect expropriation norms. This reflects that investment treaties have until recently not included general exceptions clauses, so some form of balancing exercise is occurring as part of determining whether the relevant investment protection norm is violated. In contrast in settings such as the GATT the existence of discrete exceptions clauses means that the balancing exercise comes as a distinct step, after an initial determination that the agreement has been violated.

The wording of relevant investment protection obligations was not particularly determinative of the methods of review utilised, with arbitrators employing forms of necessity testing or full proportionality review in applying provisions that did not explicitly contemplate such methods of review. Even in the *Occidental* case, where proportionality of administrative action was applicable as a matter of national law, the Tribunal went beyond this in holding that proportionality was applicable as a matter of general international law. This likely reflects that investment arbitrators, faced with striking a controversial balance between competing legal interests both protected by the regime, and vaguely worded treaty provisions that do not provide concrete guidance, have utilised legal techniques for balancing that are familiar from other international, regional and national contexts. Indeed, in *SD Myers* we saw that arbitrators explicitly drew on the fact that least restrictive means testing is utilised in other trade and environment treaties. As in the other contexts studied, the use of necessity testing or full proportionality review gave rise to certain key questions such as how readily an international tribunal should conclude that alternative less-restrictive measures, proposed by a claimant, were actually available to the regulating state. The differences between the two methods of review were also starkly illustrated by this context, with some tribunals proceeding, beyond checking whether a state measure was the least restrictive alternative reasonably available, to weigh in an open-ended manner the relative importance of the regulatory interests pursued by the measure and the investor interests impacted. These examples raise the question of whether investment arbitrators are well placed to engage in full proportionality review given they are ad hoc tribunals operating within a regime characterised by little consensus over values. This point will be taken up in the next chapter, which draws together the findings and implications of the comparative study undertaken.

VII. CONCLUSION

This thesis has asked how international adjudicators might discharge their functions given the limitations of their roles and the demands posed by the contemporary international legal order. In order to answer that question, the thesis has analysed how adjudicators across the WTO, UNCLOS, ICJ, and investment treaty contexts manage the pressing problems of change, review of state conduct, and dispute resolution, and why their practices differ. Environmental cases were used as a focus because they are litigated through a variety of adjudicatory fora with markedly different design features and functional orientations. Accordingly, this category of cases is representative of the sectorial and decentralised nature of contemporary international adjudication.¹ Our understanding of the possibilities and limits of international adjudication must be sensitive to the markedly different contexts in which adjudicators operate. Environmental cases were also an ideal lens for this inquiry because, as will be highlighted below, they raise acutely the problems of adapting treaty obligations to changes in law or facts, calibrating the appropriate standard and method of review for scrutinising domestic regulatory measures, and adjudicating in a manner that will assist the parties to resolve their dispute and rebuild their relationship.

The analytical challenge in comparing the practices of different adjudicators in response to key problems is first to identify how the practices of tribunals differ, but then, crucially, to rationalise why such differences exist. In order to meet this challenge, for each of the adjudication settings studied this thesis analysed relevant design features and other contextual factors, in light of constituent instruments, case law, and commentary. This was followed by detailed analysis of how the three selected problems were managed by adjudicators in their environmental case law. On this basis, each of the substantive chapters drew a series of conclusions regarding how the contexts and constraints within which adjudicators were operating shaped the case law produced. I also drew conclusions regarding the extent to which the practices analysed provided insights into wider problems facing adjudicators more generally, and legal techniques that were potentially transferable to other institutional contexts.

¹ Ellen Hey, *Reflections on an International Environmental Court* (Kluwer Law International 2000) 24.

This thesis partly reflected a functional approach to comparative law, developing hypotheses regarding the problems being faced by international adjudicators in particular cases, the legal solutions utilised in response, and the functions performed by adjudicators. Importantly, however, this approach was adopted after taking account of key criticisms which have been made of functional approaches within comparative law debates, such as that functional approaches underemphasise the context in which legal rules exist.² In light of such criticisms this study has paid particular attention to the numerous interrelated contextual features which shape the work of each of the tribunals studied, and to whether doctrines and institutions that appear similar in one respect nevertheless differ in other important respects.³ In existing comparisons of different areas of international law and adjudication the contentious issue of comparative methodology has too often been ignored or discussed intuitively without the benefits of comparative law literature.

The remainder of this chapter will highlight the key findings and implications arising from this study. It is convenient to address in turn the three pressing problems facing adjudicators which have been focused on throughout this study: managing change, reviewing state conduct, and assisting with dispute resolution. I will conclude with some brief remarks regarding the future prospects for comparative analyses of different areas of international adjudication.

A. Findings Regarding Adjudicators' Function of Managing Change

This thesis has demonstrated that across diverse settings contemporary international adjudicators frequently face a problem of responding to potential changes in international law, or changes in relevant facts, which affect how they should interpret and apply relevant legal norms. The broader dynamic occurring here is that the international legal system has relatively under-developed processes for law adjustment. Specifically, international law lacks a central legislative mechanism and in some areas lacks specialist regulators entrusted with adjusting rules over time.⁴ While a treaty applicable to a dispute

² See above Ch II, text at n 84-101.

³ Vicki C Jackson, 'Comparative Constitutional Law: Methodologies' in Michel Rosenfeld and András Sajó (eds), *The Oxford Handbook of Comparative Constitutional Law* (OUP 2012) 72.

⁴ Clearly there are some areas where international law has such regulators, for example in the form of conferences of the parties to multilateral environmental agreements, or the committees of domestic regulators provided for in some trade and investment agreements.

may formally remain unchanged, frequently wider international law, community concerns, and material facts will have evolved significantly by the time the agreement must be applied by adjudicators. Accordingly, international tribunals are often urged by litigants to adapt the parties' existing obligations in light of broader developments in international law, new social demands, or changed factual conditions. Nevertheless, as we have seen, adjudicators are conscious of the need to provide legal certainty through their decisions for the parties bound by an obligation. As noted in Chapter One, numerous commentators have remarked on the role of international adjudicators in balancing the competing interests of stability and change.⁵ This is a key contemporary challenge because of the significant slow-down in treaty-making in the early 21st century, the large number of cases being adjudicated before international tribunals, and the wide range of social demands that international law is expected to address.⁶ The contribution made by this part of the thesis has been to interrogate the role of adjudicators in managing change in order to explain why this role varies across contexts and precisely what is at stake.

The distinction between changes in international legal norms and changes in facts which affect what a norm requires largely maps on to the distinction between interpretation and application recognised in treaty interpretation debates.⁷ Distinguishing between these two levels of change provides a more nuanced understanding of how this problem faced by adjudicators plays out differently in particular contexts, depending on a number of relevant factors. In relation to the role of adjudicators in managing changes in international legal norms, a key variable is how active other processes of law-making are within a regime. This is because adjudicators are typically one of a number of potential law-developing actors. In both the WTO and UNCLOS contexts part of what was occurring was that with treaty-making or amendment largely stalled, given the difficulty of reaching agreement in a large multilateral setting, adjudicators were being asked to update the relevant treaties in light of wider developments in international law. However, treaty-making in these contexts is not entirely stalled, and developments at the diplomatic

⁵ See above Ch I, text at n 65-76.

⁶ See above Ch I, text at 77-79.

⁷ See above Ch I, text at n 86-87; In the investment context, changes in the host state's laws will be relevant at the stage of application. While the status of national law within investment arbitration can vary, for claims based on treaty standards, discussed by this thesis, the content of the relevant standard is a question of international law. In the subsequent step of applying a treaty standard to the facts, tribunals will often need to take notice of issues of national law: see Ole Spiermann, 'Investment Arbitration: Applicable Law' in Marc Bungenberg et al (eds), *International Investment Law: A Handbook* (Hart Publishing 2015) 1385-1388.

level may provide some dynamism. Within the UNCLOS context a preparatory process is underway to develop a legally binding instrument to address the conservation and sustainable use of marine biological diversity in areas beyond national jurisdiction.⁸ As noted in Chapter Three, the most recent WTO ministerial conference in December 2015 acknowledged significant disagreement amongst the membership about how to progress the current round of negotiations, initiated in 2001.⁹ Nevertheless, developments since then have indicated the potential for an outcome relating to fisheries subsidies at the next meeting in 2017.¹⁰

The failure to reach agreement amongst the WTO membership as a whole has also led to a proliferation of regional trade agreements (RTAs), which engage in liberalisation beyond WTO commitments and cover issues not addressed by the WTO agreements.¹¹ In practice while WTO rules place certain limits on such agreements, the WTO has only been able to exercise limited control over such agreements.¹² Thus the broader trade regime has been less static than the WTO, which this thesis focused on because very few trade disputes are litigated under RTAs.¹³ Increasingly, investment issues are addressed within chapters in RTAs rather than in separate investment treaties, although with distinct provisions for investor-state dispute settlement. As Chapter Six demonstrated, because the investment regime is constructed through bilateral and narrow plurilateral agreements and there is no broad multilateral structure it has been particularly open to change through states agreeing on new, more detailed treaties or on authoritative interpretations. The fact that investment tribunals are constituted ad hoc, and states decided not to create a centralised appellate mechanism,¹⁴ also helps explain why substantial law reform through treaty-making has been possible. In contrast, to the extent that treaty-making or

⁸ For information on the process see <<http://www.un.org/depts/los/biodiversity/prepcom.htm>>.

⁹ Nairobi Ministerial Declaration (21 December 2015) WT/MIN(15)/DEC, esp. [30].

¹⁰ See eg Jack Caporal, 'WTO Members See Fisheries Subsidies Agreement as Ripe for Buenos Aires' *Inside US Trade's Daily Report* (15 November 2016); A plurilateral agreement, amongst a subset of WTO members, aimed at reducing tariffs on environmental goods, is also currently under negotiation: see eg 'Ministerial Talks to Clinch Environmental Goods Agreement Hit Stumbling Block' (8 December 2016) 20(42) *Bridges Weekly* 1.

¹¹ For recent analysis of this issue, and the potential to develop plurilateral agreements within the WTO amongst a subset of members, see Bernard M Hoekman and Petros C Mavroidis, 'WTO "à La Carte" or "menu Du Jour"? Assessing the Case for More Plurilateral Agreements' (2015) 26 *EJIL* 319.

¹² *Ibid.*, 324-325.

¹³ See William J Davey, 'Dispute Settlement in the WTO and RTAs: A Comment' in Lorand Bartels and Federico Ortino (eds), *Regional Trade Agreements and the WTO Legal System* (OUP 2006) (arguing RTAs are unlikely to supplant the dispute settlement role of the WTO).

¹⁴ See above Ch VI, text at n 224.

amendment remains largely stalled in the WTO, UNCLOS or ICJ settings, given the difficulty of reaching agreement in large multilateral settings, we are likely to see continued demands for adjudicators in these contexts to incrementally adapt relevant international legal norms.

Another highly relevant factor influencing the role of adjudicators in updating a treaty framework is the wording of relevant treaty provisions and any relationship the treaty may already have with the new developments in international law being drawn upon. The WTO cases reviewed suggest that the role of non-WTO law within that regime remains controversial. *US-Shrimp* is an important example of WTO adjudicators interpreting a generic term in the GATT – ‘exhaustible natural resources’ – which was clearly open to such a reading, in light of contemporary international law concerning conservation. However, the use of non-WTO law is far more contested where it could alter or conflict with WTO obligations, as illustrated by *EC-Biotech* and to some degree *EC-Hormones*.¹⁵ The contested nature of non-WTO law should be understood in the context of political processes having failed to settle the relationship between the WTO agreements and multilateral environmental agreements.¹⁶ WTO adjudicators are understandably reluctant to resolve such controversial questions given the potential risks for their continued authority.¹⁷ In contrast, my analysis suggests that UNCLOS is particularly open to being affected by subsequent developments in international environmental norms given that marine environmental protection is a key goal of the Convention, which includes obligations to protect the marine environment framed in general terms and instructs tribunals to apply other relevant rules of international law. Additionally, ITLOS and UNCLOS arbitral tribunals operate within a professional community which has consistently seen marine environmental protection as a key part of its mandate.

Key instances where the ICJ interpreted bilateral river treaties in light of new norms of international environmental law – such as *Gabčíkovo-Nagymaros* and *Pulp Mills* – partly reflect that the treaties contained generally worded provisions requiring the parties to protect the environment, which would evolve in light of contemporary environmental

¹⁵ Andrew Lang, ‘Twenty Years of the WTO Appellate Body’s “fragmentation jurisprudence”’ (2015) 14 JITLP 116, 118–120.

¹⁶ Henrik Horn and Petros C Mavroidis, ‘Multilateral Environmental Agreements in the WTO: Silence Speaks Volumes’ (2014) 10 IJET 147.

¹⁷ Lang (n 15) 120–123.

standards. These developments are also explained by the ICJ's interest in endorsing new environmental norms both to demonstrate sensitivity to such developments and to influence them going forward. As Chapter Five demonstrated, the ICJ has often played an important role in coordinating or mainstreaming the concerns of different regimes within wider international law given its immense semantic authority, its general jurisdiction, and its tendency to develop generalisable propositions potentially transferable to other contexts. More broadly, the above developments show that while international law-making remains decentralised and sectorial, adjudication is an important site of regime interaction, including because statements by adjudicators are an important influence on future understandings of the relationship between different areas of international law.

The analysis undertaken also demonstrates that while adjudication makes an important contribution in incrementally updating international law, and state consent alone could not account for many of the developments considered,¹⁸ adjudicators nevertheless constantly sought to demonstrate why their interpretations were consistent with what states had already agreed to, even where those interpretations strongly favoured legal change. WTO adjudicators, as we saw, operate in the context of an explicit instruction that their rulings cannot add to or diminish the rights of members under the covered agreements. Faced with the question of whether relevant WTO norms might have changed in light of wider developments in international law, adjudicators either explained how those new norms were already incorporated within existing WTO provisions (as in *US-Shrimp* or *EC-Hormones*) or emphasised that they could not alter the content of relevant WTO norms (as the Panels did in *EC-Biotech* and *India-Solar Cells*). Similarly, in key examples where the ICJ favoured an evolutive meaning of relevant treaty terms, such as *Gabčíkovo-Nagymaros* and *Navigational Rights*, it was careful to emphasise why the relevant treaty terms were intended to evolve with changes in the law. The tendency of adjudicators to justify their interpretive arguments in terms of state consent reflects that international adjudicators are under pressure to demonstrate that their decisions respect legal certainty and stability and do not make law,¹⁹ despite state consent being a highly inadequate explanation of the manner in which contemporary international law develops

¹⁸ Similarly: Eyal Benvenisti, *The Law of Global Governance* (Martinus Nijhoff 2014) 197.

¹⁹ Ilmar Tammelo, *Treaty Interpretation and Practical Reason: Towards a General Theory of Legal Interpretation* (Law Book Company 1967) 53.

through ongoing processes of interpretation.²⁰ Overall state consent was addressed fairly consistently in all four settings when adjudicators considered whether relevant legal norms may have evolved.

The common practice across the contexts studied of adjudicators finding that the application of relevant treaty terms would be affected by changes in relevant facts reflects that the provisions concerned were, as drafted, prone to being affected by certain types of factual change. For example, in cases where WTO adjudicators acknowledged the relevance of factual changes they were applying provisions of the SPS Agreement which depended upon the state of particular facts, such as scientific knowledge or the SPS characteristics of an area, that were liable to change. Similarly, ITLOS' Seabed Disputes Advisory Chamber noted that the application of provisions requiring states exercise due diligence would depend upon the state of scientific knowledge and technical capacity. Clearly, environmental disputes, focused on by this thesis, frequently raise the issue of how changes in material facts affect the obligations adjudicators must apply. The examples in the ICJ context showed how the Court's context influenced this practice. In *Request for an Examination* the Court took no account of changes in scientific understanding of risks concerning underground nuclear testing, due to consent-based sensitivities around a lack of jurisdiction. In *Kasikili/Sedudu Island* ICJ judges were conscious of the need to respect the treaty parties' original intent, in applying a century-old colonial treaty, when making use of contemporary geographical knowledge. These refusals to take account of new factual knowledge, including regarding risk, contrast sharply with the general willingness of international adjudicators to take account of changing facts. They suggest that ICJ, given its jurisdictional situation, is particularly sensitive to consent-based concerns.

This part of the thesis has also developed a strong claim of difference concerning investment treaty arbitration. Like adjudicators in the other contexts studied, investment treaty arbitrators contribute to processes of change in international legal norms alongside other law-developing actors within this regime. This was clearly demonstrated by debates over potential changes in the international minimum standard of treatment, where states,

²⁰ See especially Ingo Venzke, *How Interpretation Makes International Law: On Semantic Change and Normative Twists* (OUP 2012).

as treaty parties, tried to limit evolution in this standard by tying it to customary international law, and arbitrators took differing views over whether the customary standard had evolved over time. Importantly, however, by applying relevant standards of investment protection in disputes, investment arbitrators also determine the permissible degree of change within the host state's regulatory system. Several factors help explain this distinct role of investment arbitrators. As explained in Chapter Six, investment treaties are designed to exercise a degree of control over public decision-making in the host state. The authoritative application function of arbitrators, in deciding whether a change in regulation violates investment treaty standards and should be compensated, determines in particular disputes how onerous that degree of international control is. This control function is particularly stark because the relevant international disciplines are framed in general rather than subject-specific terms, and there is no requirement to exhaust local remedies. While the influence of investment arbitrators over the development of legal norms at a general level in this regime appears set to decline given significant treaty-based reform by states, even in 'new style' investment treaties arbitrators continue to dominate the task of applying norms in concrete fact-intensive disputes.

The crucial application function of investment treaty arbitrators whereby they determine the permissible degree of regulatory change in the host state in particular disputes is likely to remain prominent. On the whole, states continue to provide access to investment arbitration. Key contemporary regulatory challenges, such as the shift in energy supply needed to address climate change, require states to adjust regulation, including in ways that can dramatically impact investors' interests.²¹ Investors are likely to challenge such measures before investment treaty tribunals even under reformed 'new style' treaties, for example by arguing that rare circumstances exist which mean that non-discriminatory regulatory measures nevertheless violate treaty disciplines. The first decisions in the massive set of pending cases concerning changes to states' renewable energy schemes

²¹ Regarding the impact of investment arbitration on measures aimed at shifting towards a low carbon economy see eg Gus Van Harten, 'Foreign Investor Protection and Climate Action: A New Price Tag for Urgent Policies' [2015] Osgoode Legal Studies Research Paper <http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2697555>.

suggest that a key question in these cases is the permissible degree of change in regulation.²²

Clearly other international norms applied by other types of adjudicators also exercise significant control over states' regulatory systems, for example in the context of disciplines on coastal states' enforcement powers in UNCLOS, or disciplines on particular types of trade-restrictive regulation in the WTO. Yet in none of these adjudication settings did the wider cooperative regime and the case law generated by its adjudication mechanism have the same overriding focus on determining the permissible degree of change in the regulatory system of the respondent state. My analysis has shown that a key bias apparent in investment treaty arbitration is a bias against change in the regulatory system of the host state and explained why we see this bias given the contextual features of the investment regime. As Chapter Six explained, this bias appears to be shifting towards a position where tribunals are generally open to change in the regulatory system of the host state, subject to certain conditions, such as that prior specific assurances given to investors are respected and regulatory changes are not discriminatory. This reflects that adjudicators are to some degree responding to concerns about the impact of the investment regime on the ability of states to adopt legitimate regulatory changes given changing circumstances. Moving to a default position of regulatory change being permissible will not remove the key role of adjudicators in authoritatively applying treaty standards to particular disputes. As explained above, so long as states provide investors access to international arbitration, adjudicators will continue to perform a crucial application function which determines in concrete terms what the relevant standards of treatment, whatever their content, require of the host state's regulatory system.

B. Findings Regarding Adjudicators' Function of Reviewing State Conduct for Compliance with International Obligations

1. Findings Regarding Adjudicators' Approaches to the Standard of Review

My analysis of adjudicators' practices concerning the standard of review demonstrates that this is a fundamental problem for contemporary adjudicators, who, across diverse settings, are frequently faced with how intensely to scrutinise determinations which may

²² See discussion of *Mesa Power v Canada*, above ch VI, text at n 122-124; Björn Arp, 'Charanne B.V. v. Spain' (2016) 110 AJIL 327, 331-333 (discussing this aspect of the *Charanne* Award and its implications for future cases).

have been made by domestic decision-makers employing specialised forms of expertise, applying their knowledge of local circumstances, or exercising discretion, including over value-laden matters. While much literature considers these issues with a focus on the WTO and investment treaty contexts, this thesis has extended such discussions by also analysing these issues in relation to UNCLOS and ICJ adjudication. The different treaty contexts in which adjudicators were operating clearly influenced how the standard of review arose as an issue, although most treaties do not explicitly address or clearly resolve this issue. For example, because provisions of the SPS Agreement require states' measures to be based on a risk assessment and available scientific evidence, the question of the standard of review was a crucial issue in cases where states' measures were challenged as lacking a sufficient scientific basis. In the UNCLOS cases, the question of the appropriate standard of review had to be understood in the context of the Convention giving coastal states broad powers to conserve and managing living resources in the Exclusive Economic Zone (EEZ), with the language of 'sovereign rights' suggesting an additional degree of deference is owed in this context. In short, while the standard of review is a cross-cutting problem in contemporary international adjudication, like other key challenges facing adjudicators it is always 'fitted into' the particular context in which a tribunal operates.²³

Despite clear differences in treaty context, a significant element of similarity apparent across the contexts studied was that adjudicators sought to avoid *de novo* review of the correctness of determinations based on science or other forms of technical expertise which they did not hold. Adjudicators instead repeatedly sought to exercise other more procedural forms of control over relevant domestic determinations, for example by considering whether expert input came from a respected source or whether established regulatory processes were followed. This reflects that adjudicators do not hold the specialised forms of scientific or technical expertise which often lie at heart of international disputes concerning national regulatory measures, particularly in the environmental context. As Caroline Henckels puts it, for certain types of decisions such as those involving 'gathering and evaluating complex information (including in relation to risk or harm), monitoring developing situations, engaging in consultation and

²³ See generally Georges Abi-Saab, 'The Normalization of International Adjudication: Convergence and Divergencies' (2010) 43 NYUJILP 1, 7–10.

investigating alternative courses of action', domestic decision-makers will possess greater 'institutional competence and expertise'.²⁴ This has led others to suggest that adjudicators are, by their training, much better equipped to scrutinise the decision-making procedure a state has followed, rather than the merits of a determination based on specialised expertise.²⁵

The significance of the debate concerning the standard of review in the SPS context, read in comparative perspective, is that it highlights that more procedurally inclined forms of review still require adjudicators to make important normative judgments 'in order to determine what amounts to an adequate [domestic] process'.²⁶ In many of the cases across the four contexts while adjudicators sought to avoid substitutionary de novo review of certain domestic-level determinations their decisions clearly imposed criteria regarding what would count as an acceptable domestic regulatory process. For example, the investment awards reviewed suggested that specialist domestic regulators should act within their mandate, in a non-discriminatory manner and afford procedural fairness to interested parties, such as an investor pursuing an environmental permit.²⁷

A related element of similarity which emerged across quite different regimes was adjudicators' recognition, in calibrating the standard of review, that domestic decision-makers may have greater familiarity with local circumstances, or enjoy greater legitimacy in making the relevant determination, for example if it concerned value-laden matters.²⁸ Such considerations were evident in several of the ITLOS cases reviewed, where numerous judges emphasised that in relation to measures for managing living resources in the EEZ 'national courts or authorities are better placed to appreciate all the relevant considerations of law and fact ... Hence, they should be given a broad "margin of

²⁴ Caroline Henckels, *Proportionality and Deference in Investor-State Arbitration: Balancing Investment Protection and Regulatory Autonomy* (CUP 2015) 38-4; Yuval Shany, 'Toward a General Margin of Appreciation Doctrine in International Law?' (2006) 16 EJIL 907, 918.

²⁵ See eg Joel P Trachtman, 'International Legal Control of Domestic Administrative Action' (2014) 17 JIEL 753, 754-6.

²⁶ Jacqueline Peel, *Science and Risk Regulation in International Law* (CUP 2010) 354-5; Andrew Lang, *World Trade Law after Neoliberalism: Reimagining the Global Economic Order* (OUP 2011) 346; Note that those advocating a more procedural form of review do not claim to avoid difficult normative choices: eg Michael Ioannidis, 'A Procedural Approach to the Legitimacy of International Adjudication: Developing Standards of Participation in WTO Law' 12 (2011) German LJ 1175, 1181-2.

²⁷ See case law analysed above Ch VI(C)(1).

²⁸ Also noting this factor: Henckels (n 24) 37; Shany (n 24) 919-20.

appreciation”²⁹. Likewise ICJ judges recognised the greater familiarity of domestic authorities with the required content of an environmental impact assessment in particular cases.³⁰ Numerous investment awards reviewed also recognised the comparatively greater legitimacy of domestic authorities and noted the normal role of government in compromising between conflicting interests. Arguably, these ideas are emerging as standard tropes in investment awards concerning sensitive areas of domestic regulation.³¹ This reflects that investors have used the direct access to international arbitration this regime provides to aggressively challenge a wide range of domestic regulation and tribunals are aware of the need to respond to widespread legitimacy concerns about the resulting impacts on domestic regulatory autonomy. As this process continues, a crucial question will be whether the greater legitimacy of domestic authorities in certain domains becomes a key factor in calibrating the standard of review in this regime or is merely paid lip service.

One avenue for extending my findings, particularly in relation to investment treaty arbitration, would be to analyse how the intensity of review varies between different types of cases depending on the sensitivity of the regulatory interests at stake. In the WTO SPS context some have highlighted the difference, in terms of the intensity of review applied, between ““high level” cases in which the risks at issue have a high degree of political and cultural salience in the regulating country, and the underlying science is highly contested’, and ““low level” cases’ which do not have the same political sensitivity.³² Plainly, many of the investment awards where adjudicators emphasised the deference owed to national-level authorities – such as *Methanex*, *Chemtura*, or *Bilcon* – were disputes with high political salience and contested science.³³ This reflects the focus of this thesis on environmental cases, which frequently have such characteristics.

²⁹ *M/V ‘Virginia G’ (Panama/Guinea-Bissau)* (Judgment) ITLOS Reports 2014, 4, Diss. Op. Hoffmann, Marotta Rangel, Chandrasekhara Rao, Kateka, Gao and Bouguetaia [50]; Further cases discussed above Ch IV(C)(1).

³⁰ See above Ch V(C)(1).

³¹ See cases discussed above Ch VI(C)(1).

³² Lang (n 26) 337–338; See further Jacqueline Peel, ‘Of Apples and Oranges (and Hormones in Beef): Science and the Standard of Review in WTO Disputes under the SPS Agreement’ (2012) 61 ICLQ 427, 451–457.

³³ See cases discussed above Ch VI(C)(1).

More generally, as a wide-ranging international law of cooperation is litigated in future, all three potential grounds for avoiding substitutionary *de novo* review of domestic determinations – namely domestic authorities’ application of specialised expertise, their greater familiarity with local conditions, and their greater legitimacy – are likely to remain important. In contemporary international law, determining whether states have complied with their treaty obligations frequently requires consideration of specialist forms of expertise which adjudicators do not possess,³⁴ or an evaluation of local conditions which detached international adjudicators are not well placed to make.³⁵ My analysis has demonstrated that across diverse contexts, adjudicators’ calibration of the standard of review will be bound up with acute questions concerning the legitimacy of international adjudication, and specifically its impact on domestic decision-making power.³⁶ While there are good normative reasons for adjudicators avoiding *de novo* review of certain types of decisions, it is also important that these are evaluated in the particular circumstances of a case.³⁷ The result of an overly deferential standard of review is that the treaty disciplines which adjudicators apply may be undermined,³⁸ and international adjudication could be weakened as a mechanism for securing shared international interests.³⁹

2. *Findings Regarding the Methods of Review Employed*

This study has demonstrated that the method of review, or legal test, used in determining state compliance with international norms is a fundamental issue in contemporary international adjudication because adjudicators are frequently faced with reviewing the legality of measures which further one protected interest under the relevant legal regime but also undermine other partially competing interests. All of the legal regimes studied protect a variety of partially competing goals, contain treaty provisions drafted at a high level of generality – for example requiring measures be ‘reasonable’ or ‘necessary’ – and

³⁴ Makane Moïse Mbengue and Rukmini Das, ‘The ICJ’s Engagement with Science: To Interpret or Not to Interpret?’ (2015) 6 JIDS 568, 568–9, 576; Trachtman (n 25) 754–6, 784.

³⁵ See above n 28.

³⁶ See especially Andreas von Staden, ‘The Democratic Legitimacy of Judicial Review Beyond the State: Normative Subsidiarity and Judicial Standards of Review’ (2012) 10 ICON 1023.

³⁷ Henckels (n 24) 190.

³⁸ Ibid 30.

³⁹ See Caroline E Foster, ‘Diminished Ambitions? Public International Legal Authority in the Transnational Economic Era’ (2014) 17 JIEL 355, 357, 374; Caroline E Foster, ‘Adjudication, Arbitration and the Turn to Public Law “Standards of Review”: Putting the Precautionary Principle in the Crucible’ (2012) 3 JIDS 525, 557–8.

enable adjudicators to determine certain types of disputes. The effect of such design features is that for those disputes where they have jurisdiction, adjudicators determine where the precise balance between partially competing interests lies.⁴⁰ My analysis suggests that two methods of review or legal tests are commonly utilised across the four settings studied in reviewing states' measures: adjudicators frequently employed a variant of necessity or least restrictive means testing, and less commonly engaged in full proportionality review. At one level, this reflects that these are both balancing techniques of wider relevance, which have been utilised across numerous international, regional and national adjudication settings.⁴¹ The existence of such established balancing techniques, which are often familiar from previous experiences in other contexts, is no doubt convenient for international adjudicators faced with scrutinising states' measures under treaties that do not fully resolve how to mediate between competing, legally protected interests. Again, while these issues are addressed by a significant literature in the trade and investment contexts, this thesis has extended such debates by showing that comparable questions arise in ICJ and UNCLOS adjudication. Importantly, the analysis was sensitive to the differing contextual features which shape how the question of the method of review arises in each setting.

Two key questions arising from the practices of adjudicators concern the appropriateness of full proportionality review and, relatedly, how adjudicators can apply methods of review in a manner which does not undermine legitimate regulatory measures pursued by respondent states. This thesis has suggested that in the four contexts studied least restrictive means testing is a more appropriate method of review than full proportionality review. As the WTO case law demonstrated, least restrictive means testing has the major advantage that it does not involve adjudicators second-guessing the relative importance of the policy goal, or level of protection, pursued by a regulating state.⁴² Under this method of review, adjudicators only treat as genuine alternatives those measures that would have achieved the aim selected by a regulating state, and were practically available

⁴⁰ James Harrison, 'Safeguards Against Excessive Enforcement Measures in the Exclusive Economic Zone—Law and Practice' in Henrik Ringbom (ed), *Jurisdiction Over Ships: Post-UNCLOS Developments in the Law of the Sea* (Brill Nijhoff 2015) 218, 248; For analysis of this aspect of WTO adjudication, in light of literature concerning incomplete contracts see Joel P Trachtman, 'The Domain of WTO Dispute Resolution' (1999) 40 HILJ 333, 344ff.

⁴¹ See generally Alec Stone Sweet and Jud Mathews, 'Proportionality Balancing and Global Constitutionalism' (2008) 47 Columbia JTL 72.

⁴² See above Ch III(C)(2); Jürgen Kurtz, 'Adjudging the Exceptional at International Investment Law: Security, Public Order and Financial Crisis' (2010) 59 ICLQ 325, 368–369.

at reasonable cost.⁴³ To be sure, the ICJ did not use the terminology of least restrictive means testing, and instead employed tests phrased in terms of reasonableness and developed from the relevant treaty frameworks.⁴⁴ However, these tests operated in a functionally very similar manner. The ICJ was careful not to second-guess a measure designed by a regulating state unless there was clear evidence that an alternative measure, less restrictive of other protected interests, was available.

The key argument which can be advanced in favour of employing full proportionality review in certain extreme cases is that without it a legally protected right or interest might be severely restricted by a regulatory measure pursuing a relatively unimportant, but protected interest.⁴⁵ Conceivably, such a measure could pass a least restrictive means test but fail full proportionality review given the greater importance of the restricted right or interest. This argument is not without merit. However, it presumes an agreed hierarchy of values, whereby some rights or interests protected by a legal regime can be judged as more important than other protected interests pursued by a regulating state. As commentators highlighted in the WTO context, arguably that regime is not designed to impose any comprehensive normative vision on members, but is meant to leave them free to choose which regulatory aims they pursue.⁴⁶ Overall, the other adjudication settings studied exhibit even less evidence of any agreed hierarchy between legally protected interests.⁴⁷ Where adjudicators are appointed on an ad hoc basis, and concerns exist about their representativeness, as in the polarised investment context, this adds weight to the argument that they are not well placed to engage in the value-laden exercise of full proportionality review.⁴⁸

⁴³ Ibid.

⁴⁴ See above Ch V(C)(2)(a). Potentially this could be seen as an application of the principle of good faith, specifically that a state must exercise its rights under a treaty reasonably given the obligations it has assumed: see Bin Cheng, *General Principles of Law as Applied by International Courts and Tribunals* (Stevens & Sons 1953) 125.

⁴⁵ Benedict Kingsbury and Stephan Schill, 'Investor-State Arbitration as Governance: Fair and Equitable Treatment, Proportionality and the Emerging Global Administrative Law' in Albert Jan van den Berg (ed), *50 Years of the New York Convention* (Kluwer Law International 2009) 39.

⁴⁶ See above Ch III, text at n 209-210.

⁴⁷ For similar arguments regarding investment arbitration see Henckels (n 24) 160, 164-165; Kurtz (n 42) 367-368.

⁴⁸ Prabhash Ranjan, 'Using the Public Law Concept of Proportionality to Balance Investment Protection with Regulation in International Investment Law: A Critical Reappraisal' (2014) 3 CJICL 853, 862-864; Henckels (n 24) 164.

The case law reviewed in the preceding chapters suggests that a significant risk of full proportionality review is that it creates further space for legitimate regulatory measures to be challenged and found not to be proportionate through a controversial weighing of arguably incommensurable values.⁴⁹ For example, instances of full proportionality review in both the investment arbitration and ITLOS prompt release contexts showed how public interests pursued by a regulating state, whose conduct was being reviewed, were undermined when weighed against the interests of private claimants. The *Occidental* case, where an investment treaty tribunal weighed the investor's commercial interests against the host state's interest as sovereign over its natural resources, was a stark example of this problematic tendency.⁵⁰ Similarly, in the prompt release context, where full proportionality review was endorsed by some judges this arguably amounted to the interests of a private vessel operator, with loose connections to the flag state, being weighed against the conservation interests pursued by the respondent state.⁵¹ These drawbacks of full proportionality review should be borne in mind by adjudicators who may be tempted to develop the concept of proportionality in new areas. States, as system designers, may also wish to protect their regulatory autonomy by specifying the appropriate methods of review in greater detail, as the SPS Agreement does.⁵² One avenue to extend this aspect of my analysis would be to analyse the methods of review utilised by regional human rights courts. In such contexts, adjudicators have developed substantial experience in mediating between the interests of private claimants and regulating states, including at times through full proportionality review, and there is a stronger argument in support of a hierarchy of legally protected interests.⁵³

C. Findings Regarding Adjudicators' Contribution to Broader Processes of Dispute Resolution

This thesis has analysed how adjudicators in each of the settings studied contribute to broader processes of dispute resolution. Specifically, it has considered whether adjudication is largely retrospective and seeks to dispose of the parties' dispute, or

⁴⁹ Regarding the problem of incommensurability in full proportionality review see generally Henckels (n 24) 27-29.

⁵⁰ Discussed above Ch VI, text at n 198ff.

⁵¹ See above Ch IV, text at n 227.

⁵² See above Ch III(C)(2)(c).

⁵³ See eg regarding the European Court of Human rights Henckels (n 24) 164-165, 64-66; Benedikt Pirker, *Proportionality Analysis and Models of Judicial Review: A Theoretical and Comparative Study* (Europa Law Publishing 2013) 205-232.

alternatively whether adjudication also has a prospective focus and seeks to provide guidance to the disputing parties to assist them in their future interactions, including in rebuilding their relationship after adjudication. This part of my analysis builds on a number of existing strands of scholarship. As others have suggested, international adjudication is potentially most effective, in terms of the goal of dispute resolution, where it complements a broader process driven by the parties, for example by clarifying key contested issues of law and fact before ordering the parties to engage in further negotiation.⁵⁴ Commentators focusing on particular regimes, such as WTO dispute settlement or ITLOS litigation, have often praised examples of adjudicators playing a facilitative or conflict management role, which clarifies the parties' legal obligations and pushes them to resolve their dispute through further negotiation or cooperation.⁵⁵ This aspect of my analysis gives rise to several significant findings.

Clearly, such developments are shaped by the particular treaty context concerned. For example, in considering relevant GATT Article XX jurisprudence we saw that the duty to pursue cooperative solutions, or consider the interests of affected WTO members, is not free-standing but has been developed as part of determining whether there is arbitrary or unjustifiable discrimination, which remains the focus of the 'chapeau' test.⁵⁶ Similarly, in the ICJ cases which exhibited a forward-looking and facilitative style of adjudication the obligations of the parties were developed from the particular legal context concerned, such as through the monitoring obligations and concept of preferential rights in *Fisheries Jurisdiction*, or through the relevant bilateral river treaties in *Gabčíkovo-Nagymaros*, *Pulp Mills*, or the *2015 joined cases*.⁵⁷ The prominence of a facilitative style of adjudication under UNCLOS is to a significant degree explained by the fact that the Convention contains numerous obligations to cooperate, including with regard to protecting the marine environment. Focusing on this level of specificity tends to confirm

⁵⁴ Anna Spain, 'Examining the International Judicial Function: International Courts as Dispute Resolvers' (2011) 34 *Loy LA Int'l & Comp LR* 5, 10, 30; JG Merrills, 'The Mosaic of International Dispute Settlement Procedures: Complementary or Contradictory?' (2007) 54 *NILR* 361, 368–9; Laurence Boisson de Chazournes and Antonella Angelini, 'After "The Court Rose": The Rise of Diplomatic Means to Implement the Pronouncements of the International Court of Justice' (2012) 11 *LP ICT* 1, 26–31; Vaughan Lowe, 'The "Complementary Role" of ITLOS in the Development of Ocean Law' in Harry N Scheiber and Jin-Hyun Paik (eds), *Regions, Institutions, and Law of the Sea: Studies in Ocean Governance* (Martinus Nijhoff 2013) 30.

⁵⁵ See above Ch III, text at n 231-233; Ch IV, text at n 177-178.

⁵⁶ See above Ch III, text at n 252-254.

⁵⁷ See above Ch V(D).

the suggestion made by others who have compared obligations to cooperate across different areas of international law that such obligations are ‘treaty-based. The ensuing consequences cannot be generalized.’⁵⁸

However, if we move the analysis to a slightly higher level of generality, the comparison reveals a significant and underappreciated difference, namely that in contrast to the three interstate adjudication contexts studied, in investment arbitration there is far less attention on the disputing parties’ future interactions, and the focus is largely retrospective and compensatory. The contextual features of investment treaty arbitration which help explain this finding were analysed in the last chapter. Here my focus is on comparing those features to contextual features of the other adjudication settings studied, to explain fully this finding of difference.

Whether the disputing parties have an ongoing need to deal with each other after adjudication influences why adjudicators in some contexts, and not others, have a partly facilitative and prospective focus. As explained in Chapter Six, in the investment context it is less common, but not unheard of, for the disputing parties to have an ongoing relationship by the time a dispute is decided by an arbitral tribunal.⁵⁹ In contrast, within the three interstate adjudication contexts studied the disputing parties frequently had an ongoing need to interact after adjudication. For example, the UNCLOS and ICJ cases which exhibited a forward-looking and facilitative style of adjudication essentially concerned disputes between neighbouring states or states in dispute about the management of a shared resource.⁶⁰ In a number of these disputes adjudicators also did not have sufficient knowledge to fully resolve the dispute and the parties were better placed to determine appropriate conservation measures going forward.⁶¹ In WTO adjudication the disputing parties also typically have an ongoing need to deal with each other. A representative example was provided by *US-Shrimp* where the United States (US), as the losing party, redesigned its conservation measures to comply with the

⁵⁸ Rüdiger Wolfrum, ‘Cooperation, International Law of’ (2010) *Max Planck Encyclopedia of Public International Law* [40]; Jost Delbrück, ‘The International Obligation to Cooperate—An Empty Shell or a Hard Law Principle of International Law?—A Critical Look at a Much Debated Paradigm of Modern International Law’ in Holger P Hestermeyer et al (eds), *Coexistence, Cooperation and Solidarity: Liber Amicorum Rüdiger Wolfrum*, vol 1 (Martinus Nijhoff Publishers 2012) 4, 16.

⁵⁹ See above Ch VI, text at n 208-210.

⁶⁰ See above Ch IV(D); Ch V(D).

⁶¹ *Ibid.*

relevant ruling and the reformed measures were challenged again by the prevailing parties who continued to pursue access to the US market.⁶²

Another key contextual factor which explains whether adjudication has a partly prospective focus is the type of remedies that are commonly utilised. The detailed system for remedies in WTO dispute settlement, analysed in Chapter Two,⁶³ is ‘inherently forward-looking’ and concerned with inducing future compliance rather than providing retrospective compensation.⁶⁴ It ‘gives the parties an unusually prominent role in fashioning the remedies to be applied’.⁶⁵ In a context where a losing party gets a chance to redesign its measure in a way that complies with the relevant obligations, and post-adjudication bargaining between the parties is standard, it is more plausible to suggest that adjudicators might provide guidance on the applicable legal framework but leave the parties some scope to resolve their dispute. This is why the GATT Article XX cases discussed can be read as instances where the Appellate Body has, in effect, established certain other-regarding procedural values that a regulating state must observe but refrained from resolving the underlying clash of trade and non-trade values which divides the disputing parties.⁶⁶

The ICJ cases analysed show that the Court has repeatedly placed the parties under obligations to cooperate either as part of the remedies ordered in the operative part of the judgment,⁶⁷ or through remarks within its reasoning.⁶⁸ In terms of the remedies utilised, such instances can largely be categorised as the Court issuing a declaratory judgment clarifying the legal obligations of the parties rather than as examples of true orders for specific performance which remain rare in the ICJ.⁶⁹ Nevertheless, the cases reviewed are

⁶² See above Ch III, text at n 247-251.

⁶³ See above Ch III(A)(2)(d).

⁶⁴ Brooks E Allen, ‘The Use of Non-Pecuniary Remedies in WTO Dispute Settlement: Lessons for Arbitral Practitioners’ in Michael E Schneider and Joachim Knoll (eds), *Performance as a Remedy: Non-Monetary Relief in International Arbitration* (Juris 2011) 289–90; Chester Brown, *A Common Law of International Adjudication* (OUP 2007) 220.

⁶⁵ Allen (n 64) 297.

⁶⁶ See literature discussed above Ch III(D), n 231-233.

⁶⁷ See the discussion of *Fisheries Jurisdiction* and *Gabčíkovo-Nagymaros*, above Ch V(D).

⁶⁸ See eg the 2015 *Joined cases* and *Pulp Mills*, discussed above Ch V(D).

⁶⁹ *Gabčíkovo-Nagymaros* is sometimes read as an example of the ICJ ordering specific performance, but it has to be understood in light of the special agreement submitting the case to the Court which in Article 2(2) entrusted the Court to ‘determine the legal consequences, including the rights and obligations arising from its judgment’: *Gabčíkovo-Nagymaros (Hungary/Slovakia)* (Judgment) [1997] ICJ Rep 7, 12; Christine Gray, ‘Remedies’ in Cesare PR Romano, Karen J Alter and Yuval Shany (eds), *The Oxford Handbook of International Adjudication* (OUP 2014) 876-879 (declaratory judgments remain the most frequently used

significant because they are clear examples of the ICJ seeking to assist the parties in managing their relationship going forward. Such examples have much in common with the UNCLOS cases considered where adjudicators were quite clearly playing a facilitative or conflict management role, clarifying the legal framework applicable to the parties' interactions and ordering the parties to engage in further cooperation.⁷⁰ As noted, this case law is partly explained by the fact that several of the ITLOS cases were provisional measures decisions. At a provisional measure stage it is more common for adjudicators to perform a facilitative role, utilise prospectively oriented remedies and require the parties to report back to the tribunal, in order to preserve the parties' rights pending a final judgment.⁷¹

While investment treaty arbitrators do order provisional measures aimed at preserving the disputing parties' rights until the final resolution of the merits⁷² overall the type of remedies utilised in investment treaty arbitration differ significantly from the other three adjudication contexts. Compensation is by far the dominant remedy utilised in final awards and it is rare for investment tribunals to require future cooperation between the disputing parties. At most we see investment arbitrators occasionally offering the parties 'guidance' if they wish to explore rebuilding their relationship,⁷³ or making remarks about 'expecting' the parties to negotiate in good faith as to the possibility of restitution while nevertheless giving the investor a unilateral option to request compensation.⁷⁴ As noted in Chapter Six, there are practical reasons why investors and states typically prefer pecuniary remedies in investment arbitration, including, respectively, avenues for enforcement, and sovereignty-based sensitivities.⁷⁵ The current reliance on ad hoc tribunals in investment treaties means that a tribunal will not necessarily remain in existence to monitor future compliance with a non-pecuniary order.⁷⁶ Arbitrators would

remedy in the ICJ and instances where the Court has required specific future conduct of the parties remain rare and debated).

⁷⁰ See above Ch IV(D).

⁷¹ Brown (n 64) 209–210.

⁷² See ICSID Convention, Art 47; UNCITRAL Arbitration Rules (2010), Art 26; Dan Sarooshi, 'Provisional Measures and Investment Treaty Arbitration' (2013) 39 Arb Int 361; Gabrielle Kaufmann-Kohler and Aurélia Antonietti, 'Interim Relief in International Investment Agreements', in Katia Yannaca-Small (ed) *Arbitration Under International Investment Agreements: A Guide to the Key Issues* (OUP 2010).

⁷³ *Occidental Exploration and Production Company v Ecuador (Final Award)* (UNCITRAL, LCIA Case No. 3467, 1 July 2004) [213]–[214].

⁷⁴ *Franck Charles Arif v Moldova (Award)* (ICSID Case No. ARB/11/23, 8 April 2013) [572].

⁷⁵ See above Ch VI, text at n 213–215.

⁷⁶ Allen (n 64) 303; See *Arif* (n 54) [571] (noting restitution, although the preferable remedy, could not be supervised by the Tribunal).

need to opt to retain jurisdiction over a compliance phase, a practice that is not unheard of but results in increased time and cost.⁷⁷ The emerging use of permanent courts or tribunals in investor-state dispute settlement, noted in Chapter Six, if it were widely adopted, could remove this contextual difference.

A final major factor which explains whether adjudicators play a partly facilitative, conflict management role is the prevailing paradigm in which adjudication occurs. As explained in Chapter Six, consistent with a commercial arbitration paradigm, the point of investment arbitration is often seen as enabling an investor, which enjoys markedly less bargaining power after it has sunk its capital in a host state, to obtain an order for compensation which can be enforced in domestic courts.⁷⁸ In contrast, the more forward-looking style of adjudication apparent in WTO dispute settlement partly reflects an organisation with strong diplomatic origins,⁷⁹ where members retain significant control over the dispute settlement system, and specifically, how disputes are resolved once a finding of non-compliance has been made.⁸⁰ Similarly, the forward-looking and facilitative style of adjudication apparent in many of the UNCLOS and ICJ cases reviewed reflects that in those contexts it is much more widely accepted that adjudication can complement a broader diplomatic-driven dispute resolution process.⁸¹

There is reason to think that investment treaty arbitration may benefit from making greater use of a more prospectively oriented style of adjudication. As noted above, international adjudication is sometimes most effective, in terms of contributing to the goal of dispute resolution, where it complements a wider process driven by the parties.⁸² Additionally, such an approach, if it helps create the conditions for a productive investor-state relationship to be rebuilt, would be more consistent with the object and purpose of investment treaties, which is to typically encourage international cooperation, in the form of greater foreign investment flows, as a means to the economic development of the treaty

⁷⁷ Allen (n 64) 303; For a case where the Tribunal did retain jurisdiction for a second phase concerning compliance with the Award see *Goetz et al v Burundi*, discussed above Ch VI, n 216.

⁷⁸ See above Ch VI, text at n 217-219.

⁷⁹ Robert E Hudec, 'Broadening the Scope of Remedies in WTO Dispute Settlement' in Friedl Weiss (ed), *Improving WTO Dispute Settlement Procedures: Issues and Lessons from the Practice of Other International Courts and Tribunals* (Cameron May 2000) 383 (practice of setting aside past conduct and focusing on forward-looking remedies reflects a diplomatic mode of dispute settlement).

⁸⁰ Allen (n 64) 289-90, 297.

⁸¹ Lowe (n 54) 30; de Chazournes and Angelini (n 54) 26-31.

⁸² See above n 54.

parties.⁸³ Whether a prospectively focused adjudicatory approach is appropriate will depend on the particular facts of a dispute, such as whether there is any hope of re-establishing a relationship between the parties, and whether they have an interest in future interaction.⁸⁴ This latter consideration is particularly relevant because although arbitrators enjoy discretion in awarding remedies, they are ultimately limited by the requests which are made by the disputing parties.⁸⁵ Given the disputing parties will typically have pursued the possibility of a negotiated solution prior to arbitration, investment arbitrators would need to provide significant clarity on disputed issues of law and fact, which might lead the parties to re-evaluate their positions.⁸⁶ The ability of arbitrators to provide such clarity over the legal parameters of the parties' relationship in a timely manner would also be a relevant consideration.

Within investment treaty-making there are some signs that states, as treaty drafters, are introducing more facilitative dispute resolution procedures. For example, some recent investment treaties have included, inter alia, stronger language and a clearer framework regarding the obligation to pursue an amicable settlement,⁸⁷ provision for potential mediation,⁸⁸ and greater use of focal points or joint committees, constituted by officials of the treaty parties, rather than international arbitration, to resolve disputes.⁸⁹ While these

⁸³ See above Ch VI, text at n 29.

⁸⁴ Allen (n 64) 307–8.

⁸⁵ Known as the *non ultra petita* rule: James Crawford, 'Flexibility in the Award of Reparation: The Role of the Parties and the Tribunal' in Rüdiger Wolfrum, Maja Seršić and Trpimir M Šošić (eds), *Contemporary Developments in International Law: Essays in Honour of Budislav Vukas* (Brill Nijhoff 2016) 692, 706.

⁸⁶ David Anderson, 'Negotiation and Dispute Settlement' in Malcolm D Evans (ed), *Remedies in International Law: The Institutional Dilemma* (Hart 1998) 119.

⁸⁷ See eg Comprehensive Economic and Trade Agreement between Canada and the European Union, final text after legal scrubbing of February 2016, Art 8.19 (disputes 'should as far as possible be settled amicably' and default location for consultations specified).

⁸⁸ See eg *ibid* Art 8.20; The Secretariat of the Energy Charter Treaty has in recent years developed guidelines to encourage the use of mediation for investor-state disputes under that treaty. In July 2016 the Energy Charter Conference endorsed these: CCDEC201612 (19 July 2016) <<http://www.energycharter.org/fileadmin/DocumentsMedia/CCDECS/2016/CCDEC201612.pdf>>; The ICSID Convention provides for conciliation to clarify the issues in dispute and recommend terms of settlement to the parties: ICSID Convention, Art 34(1), generally Arts 28–35; ICSID's case database indicates this has only been used ten times. Regarding the potential for greater use of this mechanism see Jack J Coe Jr, 'Toward a Complementary Use of Conciliation in Investor-State Disputes-A Preliminary Sketch' (2005) 12 UC Davis JILP 7.

⁸⁹ For example, in 2015, Brazil, which has traditionally avoided investment arbitration, concluded a series of investment treaties. Dispute resolution is primarily to occur through the use of focal points and a joint committee, constituted by officials of the treaty parties, with state to state arbitration available as a last resort. See eg Brazil-Malawi BIT (2015), Art 13 ('Disputes Prevention'); Nitish Monebhurrin, 'Novelty in International Investment Law: The Brazilian Agreement on Cooperation and Facilitation of Investments as a Different International Investment Agreement Model' (forthcoming) JIDS, s 2 <doi:

developments differ across treaties, collectively they are examples of states attempting to ‘detect, prevent and manage’ disputes with foreign investors given increasing awareness of the costs of investor-state arbitration.⁹⁰ My findings are relevant to these developments because they suggest that investment arbitration could potentially be conducted in a more facilitative and a forward-looking manner. This is an important area for potential comparative learning from the practices of the other adjudication contexts studied, where adjudication has more frequently operated in a complementary manner with other forms of dispute resolution, such as negotiation.

One avenue for further research to extend this aspect of my findings would be to study the contribution of regional human rights courts to broader processes of dispute resolution, which, for several reasons, may provide a useful comparator. Given such bodies almost exclusively decide disputes between individuals and states, this comparator may help in further analysing the influence of this contextual difference with an interstate claim. As discussed, where two states are the disputing parties they will typically have a need to deal with each other after adjudication, and hence an interest in rebuilding their relationship. In this regard, in contrast to investment treaty arbitration, where the investor-state relationship is often completely over by the time of an award, in regional human rights litigation the disputing parties may be somewhat more likely to have an ongoing relationship as the claimants are frequently individuals who reside in the respondent state. As regards the remedies typically utilised, regional human rights adjudication may also offer a rich comparator because such courts frequently award compensation, which dominates investment treaty arbitration, but also make use of more prospectively oriented remedies designed to bring domestic practices into compliance with the legal obligations concerned.⁹¹ The human rights context in which adjudication occurs may offer important contrasts with both the diplomatic orientation of the interstate contexts studied, and the commercial orientation of investment treaty arbitration. Finally, the fact that regional

10.1093/jnlids/idv028>; Some other states also use an ombudsman model: Silvia Constain, ‘Mediation in Investor-State Dispute Settlement: Government Policy and the Changing Landscape’ (2014) 29 ICSID Review 25, 30.

⁹⁰ Constain, *ibid* 25.

⁹¹ See for overview Gray (n 69) 890–95. Gray highlights that the European Court of Human Rights typically utilises declaratory judgments and financial compensation and only makes precise recommendations regarding the domestic measures to be taken in certain types of cases. In contrast the Inter-American Court of Human Rights more frequently utilises prospectively focused remedies which require the respondent state to take specific measures: Gray, *ibid*; See generally Dinah Shelton, *Remedies in International Human Rights Law* (3rd ed, OUP 2015).

human rights courts utilise permanent tribunals, which are better placed to supervise compliance with non-pecuniary awards, and that they have diplomatic mechanisms to oversee compliance,⁹² may provide a useful contrast to investment treaty arbitration.

While this part of my analysis has highlighted the potential for adjudication to productively complement broader processes of dispute resolution, it is again important that any approach is tailored to the specific circumstances of a case. There may be good reasons for favouring a more facilitative form of adjudication which enables the parties to resolve their dispute and rebuild their relationship under the guidance of a judgment. For example, in disputes between neighbouring states or states interested in a shared resource, future cooperation will often be required to conduct ongoing environmental monitoring. International adjudicators may also lack the specific knowledge required to fully dispose of a dispute, or the legitimacy needed to themselves decide upon the relative importance of the competing regulatory goals at stake. On the other hand, a risk of employing facilitative forms of adjudication without good reason is that it may weaken substantive treaty disciplines which pursue important shared international interests.⁹³ If adjudicators do not provide sufficient guidance to the disputing parties over contested legal and factual issues disputes may also remain unresolved even after lengthy litigation, as the *Gabčíkovo-Nagymaros* case showed. In particularly polarised disputes, where the parties are unwilling to re-evaluate their positions even after contested legal and factual issues are independently determined, the scope for adjudication to contribute to broader process of dispute resolution will obviously be reduced.⁹⁴ Finally, as I have suggested, there should be no doubt that more procedural forms of adjudicatory review still require difficult normative choices to be made. Specifically, adjudicators face important decisions regarding which foreign interests regulating states must consider and how far states must go in pursuing cooperative solutions.⁹⁵

⁹² See eg Convention for the Protection of Human Rights and Fundamental Freedoms (1950) ETS No 5, Art 46.

⁹³ Tim Stephens, *International Courts and Environmental Protection* (CUP 2009) 98–102; Above n 39 and text.

⁹⁴ Consider, for example, the *Philippines v China* dispute discussed above Ch IV(D).

⁹⁵ Lang (n 26) 345–348.

D. The Future Prospects for Comparative Studies of International Adjudication

This thesis has demonstrated and explained why across diverse areas of contemporary international law, international adjudicators perform a number of crucial functions, namely incrementally adapting international law, enforcing treaty disciplines, and assisting parties to resolve their disputes. The thesis has highlighted the various limitations which influence how adjudicators might discharge their functions. These include both the varied formal limitations created by states, as system designers, and also a number of more practical limitations that have become increasingly apparent with the increased adjudicatory activity of the past two decades. As we have seen, international adjudicators will often lack the legitimacy, specialist knowledge, or familiarity with local facts needed to engage in substantial lawmaking, to second-guess determinations made by regulating states, or to fully dispose of a dispute.

My findings also highlight and explain a number of significant and underappreciated differences between the adjudication contexts studied. The most original findings of this thesis include my explanation of why investment arbitrators play a distinct role in managing change in the host state's regulatory system, and why adjudication in that regime has a heavily retrospective and compensatory focus. These findings provide new insights into how investment treaty arbitration, which has rapidly emerged as a key site of international adjudication, differs in key respects from other prominent sites of adjudication. These findings come at a crucial time for this regime. They can inform ongoing debates concerning the desirability of this adjudication mechanism, and possible reforms, given its potential to prevent the adaption of host states' regulation to changing circumstances, and its tendency towards costly commercial-style disputation.

More broadly, the findings of this thesis suggest that there is considerable further potential for careful comparative analysis between different areas of international adjudication. As this study has shown, areas of international adjudication separated by artificial academic and bureaucratic barriers often involve partly comparable problems and adjudicatory techniques, and increasingly adjudicators draw on each other's practices. Some specific avenues for further comparative research were highlighted above. It would be useful to consider equivalent problems in regional human rights courts, including because they largely feature non-state claimants but differ from investment arbitration in key respects including the *telos* of the regime, the remedies utilised, and the use of permanent courts.

The influence of the varied working practices of different tribunals, which was apparent in the quite different patterns of dissent or coherence amongst the bench across the contexts studied, is also a rich avenue for further comparative analysis.⁹⁶ As international lawyers continue to analyse the marked variations which characterise contemporary international adjudication they can also benefit from drawing on the methodological insights of comparative law given that discipline's focus on explaining similarities and differences between legal systems.

International adjudication is at a crossroads. Despite the significant concerns which have arisen from the increased adjudicatory activity of recent decades, international adjudication is not about to disappear. On the contrary, across a variety of institutional contexts, adjudicators continue to be presented with a substantial number of cases. However, international adjudication is likely to adapt, as adjudicators seek to address existing concerns and new social demands through their decisions, and as states seek to adjust exiting institutions or create new ones. Against this background, this thesis has approached the task of the international lawyer as a practical, creative, and, above all, problem-solving craft.⁹⁷ Under the constructive approach developed in this thesis, international adjudication is an evolving set of institutions and legal techniques which should be refined as potential shortcomings or limitations become apparent, and as social needs change.⁹⁸ The specific contribution made by this thesis has to been to improve our understanding of pressing problems arising from the practice of contemporary international adjudication, the legal techniques which might be utilised in response, and the functions being performed by adjudicators across a diverse international legal order.

⁹⁶ See eg Jeffrey L Dunoff and Mark A Pollack, 'The Judicial Trilemma' (Manuscript of August 2016, on file); Philippa Webb, *International Judicial Integration and Fragmentation* (OUP 2013) 190–194.

⁹⁷ Martti Koskeniemi, 'Law, Teleology and International Relations: An Essay in Counterdisciplinarity' (2011) 26 *International Relations* 3, 19–20.

⁹⁸ See generally C Wilfred Jenks, *The Prospects of International Adjudication* (Stevens & Sons 1964) 771–777.

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