

Regime Conflicts in Global Environmental Governance

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**Paper presented at the 2005 Berlin Conference on the Human Dimensions of
Global Environmental Change, 2 - 3 December 2005**

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Acronyms

Bamako	-	Bamako Convention on the Ban of the Import into Africa and the Control of Transboundary Movement and Management of Hazardous Wastes within Africa
Basel	-	Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and Their Disposal
BSP	-	Cartagena Protocol on Biosafety to the Convention on Biological Diversity
CAN	-	Andean Community
CBD	-	Convention on Biological Diversity
CCALMR	-	Convention on the Conservation of Antarctic Marine Living Resources
CCD	-	United Nations Convention to Combat Desertification
CCSBT	-	Convention for the Conservation of Southern Bluefin Tuna
CEIT	-	Countries with Economies in Transition
CITES	-	Convention on International Trade in Endangered Species of Wild Fauna and Flora
COP	-	Conference of Parties
CTE	-	WTO Committee on Trade and Environment
DBU	-	German Federal Foundation for Environment
DEC	-	UNEP Division of Environmental Conventions
DRD	-	EU Directive on the Deliberate Release of Genetically Modified Organisms
EEC	-	European Economic Community
EU	-	European Union
FAO	-	Food and Agriculture Organization of the United Nations
FCCC	-	United Nations Framework Convention on Climate Change
FIELD	-	Foundation for International Environmental Law and Development
GATS	-	General Agreement on Trade in Services
GATT	-	General Agreement on Tariffs and Trade
HFC	-	hydrofluorocarbon
ICAO	-	International Civil Aviation Organization
ICCAT	-	International Commission for the Conservation of Atlantic Tunas
ICJ	-	International Court of Justice
ICNAF	-	International Convention for the Northwest Atlantic Fisheries
IDGEC	-	Institutional Dimensions of Global Environmental Change
IHDP	-	International Human Dimensions Programme on Global Environmental Change
ILO	-	International Labour Organisation
IMO	-	International Maritime Organization
IPR	-	intellectual property rights
ITTA	-	International Tropical Timber Agreement
LRTAP	-	Convention on Long-Range Transboundary Air Pollution
MEA	-	multilateral environmental agreement
NAFO	-	Northwest Atlantic Fisheries Organization
NAFTA	-	North American Free Trade Agreement
NGO	-	non-governmental organization
OUA	-	Organization of African Unity
ODS	-	ozone-depleting substances
OECD	-	Organization for Economic Cooperation and Development

OSPAR	-	Convention for the Protection of the Marine Environment of the North-East Atlantic
PAAs	-	parts of assigned amount
PAMs	-	policies and measures
PICCP	-	Rotterdam Convention on the Prior Informed Consent Procedure for Certain Hazardous Chemicals and Pesticides in International Trade
Ramsar	-	Ramsar Convention on Wetlands
SPS	-	Agreement on the Application of Sanitary and Phytosanitary Measures
TAC	-	total allowable catch
TBT	-	Agreement on Technical Barriers to Trade
TREM	-	trade-related environmental measures
TRIPS	-	Agreement on Trade-related Aspects of Intellectual Property Rights
UN	-	United Nations
UNCLOS	-	United Nations Convention on the Law of the Sea
UNCTAD	-	United Nations Conference on Trade and Development
UNDP	-	United Nations Development Programme
UNEP	-	United Nations Environment Programme
UNESCO	-	United Nations Educational, Scientific and Cultural Organization
VCLT	-	Vienna Convention on the Law of Treaties
Waigani	-	Waigani Convention to Ban the Importation into Forum Island Countries of Hazardous and Radioactive Wastes
WHO	-	World Health Organization
WSSD	-	World Summit on Sustainable Development
WTO	-	World Trade Organization

Abstract

The paper addresses one of the conference's major focuses, namely the interplay of international organizations in global environmental governance. More concretely, its emphasis is put on conflicts among international regimes which these organizations are entrusted to administer or enforce. It develops a comprehensive analytical framework for the analysis of such conflicts in three steps:

First, it provides a definition of regime conflicts which does not only refer to the contradiction of rules, but also allows for the inclusion of anticipative and manifest controversies among actors, hence exceeding the merely legal dimension of such incompatibilities.

Second, it identifies distinctive criteria (including the degree of conflict manifestation, conflict arenas, actors involved), thereby differentiating between various types of regime conflicts. Moreover, a further typology distinguishes (potential) solution strategies.

In a third step, the paper presents hypotheses about the consequences of international regime conflicts. Clearly eschewing the reductionism of earlier conceptual approaches to the study of institutional interactions, these assumptions are re-framing existing regime theories and their major variables (e.g. situation structure, problem structure, relative gains, consensual knowledge, bureaucratic leadership) in two ways: first, as relational or interactive hypotheses which explain the overall effectiveness-reducing impact of regime conflicts; second, as relative or comparative hypotheses which explain the distribution of these consequences among the involved regimes.

Introduction

This paper is a work-in-progress and summarizes the current status of a dissertation project, which is funded by the German Federal Environmental Foundation (DBU). The general objectives of the project underlying this paper are *to systematically capture conflicts which take place among international regimes in the context of global environmental governance, and to gain and test theoretical assumptions about the impact of these conflicts*. These objectives unfold into the following questions:

1. To what extent have conflicts among international regimes on issues of international environmental protection appeared so far (= taking stock)?
2. To what extent can these conflicts be distinguished systematically, based on significant criteria? In other words: Which types of international regime conflicts exist?
3. Which theoretical assumptions can be gained with regard to the effect of these conflicts on the involved regimes? Which regime prevails under which conditions?
4. To what extent do these assumptions pass or flunk tests in the form of in-depth analyses of selected cases?
5. To what extent can some of the research results be translated into policy propositions?

Resting upon Keohane's definition, regimes are conceived as a particular type of institutions, namely "institutions with explicit rules, agreed upon by governments that pertain to particular sets of issues in international relations" (Keohane 1993: 28). Conflicts, i. e. incompatibilities between international regimes, may either appear *between the rules* of different regimes, or in the form of debates and clashes *between actors* who justify their behavior by referring to different regimes.

On the one hand, the project focuses on international environmental regimes, i. e. regimes which have been particularly designed for the purpose of setting rules to the dealing with transboundary environmental problems; on the other hand, it also takes into account international free trade regimes, since the latter – due to the cross-cutting scope of their subject matter – may prove highly relevant for the political approach to ecological challenges – and thus, for the effectiveness of environmental regimes.

This paper will present preliminary research results with regard to the first three of the above questions. After outlining the project's background and the state of the art of IR research about international regime conflicts (*Ch. I*), it will provide a definition of the research object (*Ch. II*), drawing from existing definitions of international regimes and regime overlaps. *Chapter III* includes a typology of regime conflicts based on distinctive criteria along with a couple of examples in order to illustrate the different conflict types. Building on this typology as well as on different schools of international regime theory, the *fourth and final chapter* develops assumptions about the impact of regime conflicts on the effectiveness of the involved regimes.

I. Background

I.1. Starting Assumption: Increasing Compatibility Problems among International Regimes

The ongoing regulation process in international relations has to some extent led to partially detrimental substantial and functional overlaps between regimes, i.e. the various rules addressing a specific issue area do not always make up a coherent and complementary system. Instead, most of these rule systems have been developed independently of each other, do cover different geographic and substantial scopes, and are partly marked by very different patterns of codification, institutionalization and cohesion including different compliance mechanisms and sanctioning capacities.

The emphasis on such incompatibilities, however, should not be mistaken for a return to a classical realist's view of world politics as an anarchic environment (cf. Mearsheimer 1994); quite on the contrary, there basically is no area in today's international relations which is not in some way regulated (although there certainly exist significant differences in the regulative density across issue areas). The assumed problem, therefore, rather is one of new – and still evolving – obstacles to the implementation and effectiveness of international law, caused by this very tendency toward regimentation. Accordingly, the starting assumption holds that though world politics is not or no longer anarchic in the first place, it tends to be chaotic or fragmentary (Bernauer/Ruloff 1999: 18).

I.2. State of the Art

There can be no doubt that international relations theory, in particular the neo-institutionalist school of thought, has profoundly captured the increasing interconnection on the international level. In fact, since its beginnings during the 1970s, research on international regimes has steadily been widening its focus: after a first stage of dealing with the formation of separate trade and security regimes, scholars eventually tended to address regimes operating in other issue areas such as human rights, environment, transport and communication, including studies on regime robustness and effectiveness (cf. Mayer/Rittberger/Zürn 1993).

But it took until the second half of the 1990s until – in the words of Bernauer/Ruloff (1999: 17f.) – a “third wave” of research on international regimes started to break: the consideration of regime overlaps appearing within issue areas and at issue area intersections.¹ One of the first scholars to draw attention to the problem of regime interaction in a comprehensive manner was Oran Young (1996) with his first typology of institutional linkages.² Another very noteworthy discussion of the theoretical implications of regime interplay has been provided by Olaf Schram Stokke (2001),

¹ Of course, as both authors stressed, this horizontal or relational approach to international regimes would have to be a complementary one: it should rely on the continuing and indispensable analyses of the formation and effectiveness of *separate* regimes. Such analyses – on which future relational studies can build on – include Underdal/Young (2004) who also address the problem of regime interaction (in particular the contribution by Gehring/Oberthür), Pamela Chasek's analysis of three decades of environmental diplomacy, developing a phased process model of regime formation and implementation (Chasek 2001), or the multi-variate analyses carried out by the groups around Young (1999) and Miles/Underdal et al. (2002), the latter evaluating the effectiveness of as much as 14 environmental regimes (cf. Andresen/Wettestad 2004).

² Another early comprehensive approach to the problem of regime overlaps was provided by Herr/Chia (1995).

especially since he linked the new research agenda to the effectiveness of the involved regimes. Stokke (ibid.: 8) also pointed at an “excessive orientation towards disruptive aspects of interplay” and comparatively little attention to aspects of mutual enforcement. As much as this observation was true at the time, it still has to be put into perspective in a double sense: first, when it comes to incompatibilities among rules, studies on conflicts between *national* regulations and international regimes still clearly outnumber the analyses of the incoherence among international regimes on both sides of the fence. Second, wherever the latter have been carried out, they were conducted in the form of *singular* case studies. (Hence, an encompassing comparative project on regime conflicts is still missing!)

Moreover, though Stokke’s observation was more than justified in view of singular case studies, the larger and more encompassing research projects have always had a general outlook on regime interplay, i. e. they did not only include case studies on incompatibilities, but also and for the most part on synergetic or redundant constellations. Three of these projects are particularly noteworthy: first, the Inter-Linkages Initiative of UN University (Chambers 2001; Velazquez/Piest 2003) which focuses mostly on interactions among different environmental regimes, and second, the Institutional Interaction Project conducted by four research institutions (Ecologic, Institute for European Environmental, Foundation for International Environmental Law and Development [FIELD], Fridtjof Nansen Institute) (Gehring/Oberthür 2003, 2004, 2004a).³ Finally, a third and still ongoing major project on regime interplay, the Institutional Dimensions of Global Environmental Change (IDGEC) project, has been developed under the auspices of the IHDP. The research project – the final results of which will be presented in 2006 – focuses on the causality, performance and design of international institutions with regard to global environmental change and thereby also takes into account the horizontal and vertical interaction of institutional arrangements (cf. King 1997; Young 2002, 2002a).

Looking briefly beyond the discipline of international relations, it is particularly international lawyers who have addressed the incompatibilities of rules of different international regimes. Given their encompassing approach, two recent publications by Neumann (2002) and Pauwelyn (2003) on the conflicts and co-ordination strategies between WTO law and other international legal systems are particularly noteworthy.

Thus, especially in the last five years, several studies have been conducted on regime interplay by scholars of different disciplines. Again, what is still missing is a more detailed and encompassing focus on a particular type of interaction, namely on regime *conflicts*; the concrete research *lacunae* include: 1. a particular synopsis of existing cases of regime conflicts; 2. theory-driven comparative analyses of the consequences of regime conflicts, i. e. of the mechanisms by which these conflicts alter the effectiveness of the involved regimes; and 3. comparative studies about (reasons for) the genesis of regime conflicts. In view of the aforementioned research questions, the project underlying this paper intends to contribute to the first two of these demands.

³ This project has produced a valuable taxonomy of institutional interactions which has served as an important basis for the typology of regime conflicts presented further below. More importantly even, the project comprises a remarkable number of case studies mostly concerning the interaction of international treaty systems and EU environmental instruments. As far as these case studies cover incompatibilities among international agreements, they will be used as a sample in order to illustrate the below typology.

II. Definition of International Regime Conflicts

This paper builds on Robert Keohane's definition of regimes as "institutions with explicit rules, agreed upon by governments, that pertain to particular sets of issues in international relations and which are referred to in an affirmative manner by governments, even if they are not necessarily scrupulously observed" (Keohane 1993: 28). The last part of this definition takes into account that rules might have become obsolete without having been altered or abolished. But what is more important about his definition, and what distinguishes it from Krasner's broader understanding of the term,⁴ is its straight focus on the explicitness of rules. For the purpose of the project underlying this paper, this concentration proves useful when it comes to assessing the impact of regime conflicts on the effectiveness of the involved regimes: since rules partially include precise behavioral instructions, they allow for measuring changes in the compliance or non-compliance with the respective regime (Müller 1993: 41).⁵

Starting from this understanding, the next step towards a definition of regime conflicts is to look at the more general phenomenon of regime interactions. In his taxonomy, Oran Young (1996: 2ff.; cf. King 1997: 18ff.) differentiates between four types of such "institutional linkages":

- 1. "*embedded institutions*" (= issue-specific regimes embedded in overarching institutional arrangements);
- 2. "*nested institutions*" (= specific arrangements restricted in terms of functional scope, geographical domain, etc. "are folded into broader institutional frameworks that deal with the same general issue area but are less detailed in terms of their application to specific problems");
- 3. "*clustered institutions*" (= regimes combined with other regimes of other issue areas into "institutional packages", i. e. a common and more generic framework);
- 4. "*overlapping institutions*" (= regimes formed for different purposes and largely without reference to one another intersecting "on a de facto basis, producing substantial impacts on each other in the process").

Unlike the first three types of regime linkages, the overlap of institutions is "often unforeseen and unintended by the creators of individual regimes" (ibid.: 6). International regime conflicts belong to this fourth type. However, *they are not to be equated with it, since the mutual impact of an*

⁴ Krasner (1983: 2) defines regimes as "sets of implicit or explicit principles, norms, [binding] rules, and decision-making procedures around which actors' expectations converge in a given area of international relations. Principles are beliefs of fact, causation, and rectitude. Norms are standards of behaviour defined in terms of rights and obligations. Rules are specific prescriptions or proscriptions for action. Decision-making procedures are prevailing practices for making and implementing collective choice."

⁵ The focus on explicitness further implies that – in the course of this paper – the terms "environmental regime" and "multilateral environmental agreement" (MEA) will be used synonymously.

While distinguishing international regimes from other types of international institutions, Keohane (1989: 3) states that, unlike organizations, regimes are not "purposive entities [...] capable of monitoring activity and of reacting to it." Nevertheless, by focusing on incompatibilities between international regimes, the research project will necessarily also capture conflicts between organizations. Regimes are what organizations collide about: they can be part of organizations which can initiate, administer or enforce them. In many cases, regimes are even forerunners of organizations (e. g. GATT for the WTO). Therefore, the research project will also use the term "regime conflict" for collisions of two international organizations as long as these collisions can be traced back to the incoherence between regimes under their respective auspices (e.g. the conflict between the CBD [UNEP] and the TRIPS agreement [WTO]).

unforeseen intersection could also prove to be positive, i. e. synergetic. (Example: the dynamics and trigger effects between the non-binding North Sea Conferences, the binding Oslo and Paris Conventions for the Prevention of Marine Pollution and different binding EC directives, e. g. on nitrates and urban waste-water).

Hence, for a proper definition of regime conflicts, one more aspect needs to be added to Young’s understanding of this fourth type of overlapping institutions. This missing link is the aspect of “contradictive externality”. The term “contradictive” borrows from Dahrendorf’s definitions of “conflict” as any kind of relation between elements which is characterized by objective (latent) or subjective (manifest) contradictions (Dahrendorf 1961: 201). Contradictive *externality* implies that another regime – *outside* the behavioral complex of an environmental regime – collides with the objectives and rules of this environmental regime.⁶

Subsequently, a regime conflict can be defined as:

a functional overlap among two or more international regimes (formed for different purposes and largely without reference to one another), consisting in a significant contradiction of rules and/or rule-related behavior.

III. Types and Examples of International Regime Conflicts

In the following, I will identify distinctive criteria in order to differentiate between various types of international regime conflicts. With my own survey still on the way, I will mostly utilize in this paper the samples of the UNU Interlinkages Project (Chambers 2001) and the Institutional Interaction Project (Gehring/Oberthür 2003, 2004, 2004a) in order to illustrate the characteristics of each type of conflict. I will first (Ch. III.1) define and illustrate main types of regime conflicts which I will distinguish by their degree of manifestation and directness (see Figure 1). In a second step (Ch. III.2), I will introduce further criteria in order to refine this typology. Finally, I will summarize the different types and examples in an overview chart (Ch. III.3).

Latent Conflicts	Manifest Conflicts	
	Direct Conflicts	Indirect Conflicts

Figure 1: Main Types of International Regime Conflicts

⁶ The understanding of “external” follows the study of Young/Levy (1999) on regime environmental effectiveness. There, the terms “internal” and “external” refer to the behavioral complex each regime is embedded in, i. e. the problem to be solved, the different stakeholders and their interests, etc. However, Young/Levy are pointing at consequences of a single regime in relation to its own effectiveness. Unhelpful external effects are, thus, non-intended consequences outside of the regime’s geographic and/or substantial scope, contradicting the objectives of the very regime, producing, in the worst case, boomerang effects.

III.1. Main Types

The aforementioned rather broad definition of international regime conflicts in terms of contradictive externalities makes it possible to account for more cases than it would have been with a more narrow, i. e. merely legal definition. Since the research project approaches the subject from a political scientist perspective, the objective is to particularly account for types of conflicts *beyond* the mere collision of rules. Thus, I will distinguish a latent (or legal) type of regime conflicts from what I term manifest (or political) types of conflicts. This distinction shall also prove useful for analytical reasons when it comes to testing assumptions about the effect of regime conflicts. However, in reality, the variability of regime conflicts over time implies that one rather has to expect mixes or, put more aptly, sequences of the different types.

III.1.1. Latent Conflicts

Latent conflicts are “solely” incompatibilities of rules, i. e. they are not manifested in an immediately perceivable conflictive behaviour of actors. Building on the aforementioned general definition of regime conflicts, I define a latent conflict as:

a functional overlap among international regimes taking shape in the form of a significant contradiction of rules, but without being manifested in the contradicting behavior of actors.

Latent conflicts are, for the time being, the regime conflicts mostly under consideration by scholars, especially those of international law. Latent conflicts are preceding most cases of what further below will be defined as manifest conflicts. Therefore, it should not come as a surprise that for the type of latent conflicts, a number of *examples* can be given which might be well familiar to the reader.

The most prominent cases are those of conflicts between the trade provisions of MEAs on the one hand and GATT rules on the other hand. Already in 1996, the WTO Committee on Trade and Environment (CTE) identified “about 20” MEAs containing trade provisions. Of these MEAs, three in particular authorize measures that clearly violate GATT rules through so-called TREMs (trade-related environmental measures), namely the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES), the **Montreal Protocol** (as well as other protocols and amendments to the Vienna Convention for the Protection of the Ozone Layer) and the **Basel Convention** on the Control of Transboundary Movements of Hazardous Wastes and Their Disposal. All three regimes collide with GATT “by banning the import of various substances on the basis of the status of the country of origin (e. g. countries that are not Parties to the MEA, Parties to the MEA that fall into particular categories, and Parties not in compliance with the MEA).” (Werksman 2001: 183). Despite these contradictions, so far, there has never been a WTO challenge to a trade-related measure authorized by an MEA. This rather surprising evidence justifies the classification of these incompatibilities as merely “latent conflicts”.⁷

⁷ Werksman (2001: 183f.), without further testing these assumptions, offers three possible explanations for the absence of manifest disputes in the three cases: 1. the self-restraint by WTO members that are also Parties to these MEAs; 2. the broad participation on both sides (all three MEAs have a high number of parties); 3. the minor economic impacts of the trade in endangered species, ozone-depleting substances (ODS) and hazardous waste.

III.1.2. Manifest Conflicts

Unlike latent conflicts, manifest conflicts don't or do not *only* appear among rules, but have materialized in the form of disputes or behavioral contradictions among actors. Accordingly, I define a manifest conflict as:

a functional overlap among international regimes manifested in disputes between actors who are referring to these regimes.

The term "referring" leaves open *when* in a regime's life-cycle (e. g. during negotiations or after entry into force), *where* (e. g. within regime organs or before courts of third parties) and, most of all, in which context or *why* (e. g. because of their initiatives for regime change or because of their compliance with contradicting rules) certain actors come into conflict with each other. Moreover, the definition does not foreclose *who* these actors are (e. g. states [parties, non-parties] or bureaucracies). This calls for the introduction of further distinctive criteria which I will present below.⁸ At this point, a first major distinction shall be applied according to another question, namely the extent to which manifest conflicts are preceded by a latent conflict, i. e. how far they are linked to an explicit incompatibility of regime rules.

III.1.2.1. Direct Conflicts

Direct manifest regime conflicts are manifestations of immediate incompatibilities of the rules of different regimes (cf. Bernauer/Ruloff 1999), in other words: a direct manifest regime conflict is preceded by the appearance of a latent conflict. Thus, a direct manifest conflict is defined as:

a dispute or behavioral contradiction among actors who are justifying their actions by explicitly referring to the colliding rules of different regimes.

In order to illustrate the type of direct manifest regime conflicts, I will briefly sketch the *example* of a dispute between two states, namely between Canada and Spain. In accordance with the definition, this dispute has been the consequence of a latent conflict between two international regimes. The conflict had become manifest when the Canadian Navy arrested a Spanish flag halibut-fishing vessel in the high seas, just outside the Canadian 200-mile zone, in March 1995. Canada justified this action by referring to the rules of the **Northwest Atlantic Fisheries Organization (NAFO)**⁹ which promotes the conservation of several fishery resources¹⁰ in the "waters of the North-west Atlantic Ocean north of 35°00' latitude" (Article I.1). The Canadians claimed that, at the time of the incident, NAFO's annual total allowable catch rates for halibut had already been exceeded. On the other hand, Spain, though indirectly being a NAFO member (via the European Union), interpreted the Canadian behavior as a violation of the **UN Convention on the Law of the Sea (UNCLOS)** which grants countries the right to protect their marine environment only within their 200-mile

⁸ See below: Ch. III.2.

⁹ More precisely, Canada referred to its national Coastal Fisheries Protection Act which again is based on the multilateral agreement underlying NAFO. This agreement, the Convention on Future Multi-Lateral Co-operation in North-East Atlantic Fisheries, entered into force in 1979. It has 18 members, including the European Union, Canada, USA, Russia and Norway. (The preceding document was the 1949 International Convention for the North-West Atlantic Fisheries [ICNAF]).

¹⁰ "with the following exceptions: salmon, tunas and marlins, cetacean stocks managed by the International Whaling Commission or any successor organization, and sedentary species of the Continental Shelf" (Article 1.4).

zones (“exclusive economic zones”). What made things even more complicated was that at that time, Canada – unlike Spain – had not yet ratified UNCLOS.¹¹ The conflict was finally settled by an agreement in April 1995 between Canada and the EU, regarding control and enforcement measures such as a satellite tracking system.¹² Nevertheless, Spain appealed to the International Court of Justice (ICJ) who, remarkably, in its December 1998 ruling, stated that “the Spanish submissions no longer have any object” (Article 215) and that the court lacked jurisdiction to adjudicate the dispute (Bernauer/Ruloff 1999: 13f., 35ff.).

III.1.2.2. Indirect Conflicts

The definition of regime conflicts as contradictive externalities makes it also possible to account for unintended consequences of certain rules. An indirect manifest regime conflict shall be defined as: **a behavioral contradiction among actors whose actions have been (unintentionally) induced by otherwise non-colliding rules of different regimes.**

This implies: unlike in the case of direct conflicts, there is no direct contradiction among rules of two different regimes which precedes this contradiction in behavior. However, at least one of these regimes may include rules which promote a certain behavior running contrary to the objectives of the other regime. Therefore, one could also term this type “disincentive type” or “behavioral type”.¹³

A noteworthy *example* of an indirect regime conflict is at the same time what I term a “single-issue conflict”,¹⁴ i. e. a case of behavioral incoherence which has occurred between two environmental regimes. Such a case exists between the **Kyoto Protocol** and the **Montreal Protocol**. On the one hand, both regimes, the climate change regime and the ozone regime, are based on common principles of environmental concern, specifically with regard to threats to the global atmosphere. On the other hand, an evident incompatibility exists with regard to so-called hydrofluorocarbons (HFCs). After the phasing-out of several ozone-depleting substances (ODS) by the Montreal Protocol and the following amendments to the Vienna Convention,¹⁵ HFCs were left as one of the major substitutes with no indication of an ozone-depleting effect. Thus, though none of the conventions explicitly mentions HFCs, the treaties have given a significant incentive for respective companies to use HFCs. However, while HFCs are important substitutes for ozone-depleting

¹¹ Though UNCLOS had already entered into force on 16 November 1994, Canada only ratified the convention in November 2003.

¹² In fact, this agreement even confirmed NAFO’s 27.000 ton total allowable catch rate (TAC) for Greenland halibut. Furthermore, Spain and Portugal were excluded from Canadian Coastal Fisheries Protection regulations.

¹³ This type should not be confused with the type of “behavioral interaction” used by Gehring/Oberthür (2004: 21f.) which rather comes close to this paper’s general type of manifest conflicts.

NB: Strictly speaking, at this stage of the project, it is not completely accurate to assign all of the following examples to the sub-type of indirect *manifest* conflicts: this reservation concerns those examples in which a contradictory behavior of states parties is considered highly *probable*, but which still lack empirical evidence of such manifest behavior. Thus, for the time being, those cases rather would fall into a twilight category of “indirect *latent* conflicts”. However, in order to avoid confusion and having high hopes for the relevant evidence to be gained, I have done without such a provisional category.

¹⁴ See below: Ch. III.2.1.1.

¹⁵ The ODS banned by the Montreal Protocol and the following treaties are listed in Articles 2A-2I (CFCs, halons, other fully halogenated CFCs, carbon tetrachloride, methyl chloroform, hydrochlorofluorocarbons, hydrobromofluorocarbons, methyl bromide, bromochloromethane).

substances and, thus, are part of the solution within the ozone regime, they also represent destructive greenhouse gases to be phased out within the climate regime (Rosendal 2001: 99).

III.2. Further Distinctive Criteria

In the following, I will introduce additional criteria in order to complement and refine the typology of regime conflicts presented up to this point. These additional criteria can be divided into two groups: one group of properties of the regimes which are involved in a conflict (e. g. their functional and geographical scopes), the other group including properties of the conflicts as such (e. g. conflict time and conflict place/arena).

Before getting into detail, I would first like to point out an important epistemological difference between these two groups: whereas the criteria of the second group, i. e. conflict properties, are already situated at an interactive level, the criteria of the first group, i. e. regime properties, originally are situated on the “unit-level” of *separate* regimes. In order to make these properties useful for the analysis of regime interaction, they first need to be framed in a relational way. In other words: they have to refer to the relational difference between the conflicting regimes with regard to their respective properties. For example, depending on the geographical scope of conflicting regimes (if one simply differentiates between global range and regional range), three relational constellations are possible: global-global, global-regional, and regional-regional.

III.2.1. Properties of Involved Regimes

III.2.1.1. Problem Structure: Single-issue Conflicts or Cross-issue Conflicts

As mentioned in the preceding chapter on indirect conflicts, there are exceptions to the intuitive assumption that international regime conflicts only take place between regimes designed for different policy fields or problem structures, such as environmental protection, free trade, human rights, etc. In fact, the effectiveness of an environmental regime can also be hampered by overlaps with another environmental regime, though, as Gehring/Oberthür (2003: 26) have shown, synergy effects between overlapping regimes of the same policy fields are much more frequent. Thus, based on the criterion of (relational!) problem structure, this paper distinguishes between *single-issue conflicts*, taking place among environmental regimes, and *cross-issue conflicts*, taking place between an environmental regime and a trade regime.¹⁶

¹⁶ Beyond its typological use, there are further analytical implications to the distinction between single-issue and cross-issue conflicts. For example, the distinction between single-issue and cross-issue conflicts should prove useful for studies on regime conflicts which completely concern issue areas other than environmental protection, e. g. international regime conflicts on security issues (cf. Daase 2004; Grigorescu 2004; Hardy/Phillips 1998; Wallander/Keohane 1999). Moreover, the criterion of relational problem structure opens up a whole new research agenda for neo-institutionalist theory, since it makes it possible to lift up the so-called problem-structural approach of neo-institutionalism to the level of inter-regime conflicts: this approach originally predicts that conflicts among actors on welfare issues could rather be overcome than conflicts on security issues (Rittberger/Zangl 2003). Lifted up to the inter-regime level, the equivalent research question would be whether this prediction might hold true not only for conflicts among actors, but also for conflicts among regimes, i. e. are regime conflicts on welfare issues more likely to be solved than regime conflicts on security issues?

III.2.1.2. Geographical Scope / Jurisdiction: Global or Regional

A second important property of the affected regimes apart from their problem structure or policy field, is their geographical scope, and, subsequently the range of their jurisdiction. Roughly, one can distinguish between regimes operating on a global level such as the GATT or the CBD, and regional regimes such as the International Commission for the Conservation of Atlantic Tunas (ICCAT) or the Convention on the Conservation of Antarctic Marine Living Resources (CCALMR). As mentioned before,¹⁷ when framing this distinction relationally, it opens up three possible conflict constellations: among two or more global regimes (*global-global*), among two or more regional regimes (*regional-regional*) – here, one still would need to determine the geographical intersection of the involved regimes –, and among global and regional regimes (*global-regional*).

To give *examples* for the latter constellation: the two regional regimes which have just been named, **ICCAT and CCALMR**, both include import bans (based on production methods) which – just like in the cases of CITES, the Basel Convention, and the Montreal Protocol – contradict **GATT**'s most-favored nation principle without having become manifest so far (Chaytor/Palmer/Werksman 2003: 7f.). Therefore, these examples can be assigned to the subtype of latent global-regional regime conflicts.

III.2.2. Properties of Regime Conflicts

Unlike the aforementioned regime properties, the criteria presented in this section are only applicable to the type of direct manifest regime conflicts, since they refer to features of immediate disputes between actors.

III.2.2.1. Time and Place: Internal Conflicts about Regime Change or External Conflicts due to Regime Compliance

The major reason for the introduction of the double criterion “time/place” is that, in the literature and in the course of my own analysis up to now, I could hardly find cases in which a direct regime conflict had solely taken place “outside” a regime. By “outside” I understand: not appearing within regime organs, but instead occurring “in the field” when parties comply with contradictory regime rules. In fact, the only pure example of such a case is the abovementioned dispute between Canada and Spain on the issue of halibut fishing.¹⁸

Hence, rather than in the form of conflicts between states parties when *abiding* to regime rules (= **regime-external conflicts**), regime conflicts tend to become manifest in a different setting, namely when *reflecting* rules *within* regime organs (= **regime-internal conflicts**).¹⁹ More precisely, a regime-internal conflict appears whenever the (hitherto latent) contradiction between rules is

¹⁷ See above: introduction to Ch. III.2.

¹⁸ See above: Ch. III.1.2.1.

¹⁹ This distinction of regime-external and regime-internal conflicts partly follows Gehring/Oberthür (2003: 8f.; 2004: 9f.) who name different causal mechanisms of one (source) institution's impact on another one (target): on the one hand this impact can take place on the *output* level, i. e. on the level of the decision-making process within institutions, and on the other hand, on the *outcome* level, i. e. the level of regime performance and consequences.

explicitly reflected and debated by actors, including active *attempts to alter or amend the rules* of at least one of the affected regimes.

Such attempts can take place in two kinds of constellations: first, they can be launched *within the organs of one and the same regime* (i. e. on the intra-regime level), e. g. when one or more states parties push for certain regime changes such as the inclusion of priority clauses explicitly referring to other regimes;²⁰ second, respective attempts can also be made *between the organs of the conflicting regimes* (i. e. on the inter-regime level), e. g. when the secretariat of one regime explicitly requests changes in the documents of another regime. Furthermore, regime-internal conflicts can occur at different stages of a regime's life-cycle, for instance during the primary negotiations as well as after the adoption of the relevant documents, and even after their entry into force when debating treaty changes, amendments or protocols (cf. Andersen 2002).

Before naming an example of a regime-internal conflict appearing at different points in a regime's history, it is important to clearly point out that not *any* kind of internal reflection of contradictory regime rules justifies the classification as a *manifest* internal conflict. In fact, each rule collision, i. e. each latent conflict analyzed so far, has at least appeared in one way or another on the agenda of an affected regime; or it has even become the subject of consultations between the involved regimes. However, dealing with incompatibilities does not automatically implicate that disputes among actors and/or subsequent active attempts to amend or alter a regime have taken place.

Let me illustrate this important difference by coming back to some of the latent regime conflicts mentioned earlier in this paper.²¹ During the negotiations of the Montreal Protocol, the parties agreed on the establishment of an *Ad Hoc* Working Group of Legal and Technical Experts which should detect and prevent potential collisions of the Protocol with GATT rules. Surprisingly though, this Working Group did not see any need for immediate action such as modifying the text of the protocol (Chambers 2001a: 102f.).²² Still, this was not the only reflection on the matter: in 1999, a cooperation agreement between the secretariats of the WTO and UNEP was signed which included the regular exchange of information on legal issues. Furthermore, following the compatibility request of Article 31 of the Doha Declaration, the WTO's Committee on Trade and Environment (CTE) discussed several models of harmonizing the contradictions between GATT and the trade-related measures of MEAs (von Moltke 2003). However, in all of these cases, no controversies, i. e. behavioral contradictions, among working group members or regime bureaucracies have taken place, particularly not in the form of direct attempts to alter a regime (e. g. in the form of an explicit request for change or an amendment) which could justify the classification as *manifest* conflicts (Santarius/Dalkmann et al. 2004: 25ff.). Instead, the parties *agreed* that *no* legal action at all needs to be taken with regard to potential incompatibilities.

As an *example* for a case where such behavioral contradictions exist, I like to refer to the well researched (cf. Rosendal 2000, 2001, 2003, 2003a) incompatibility between the Convention on Biological Diversity (**CBD**) and the Agreement on Trade-Related Aspects of Intellectual Property Rights (**TRIPS**). This conflict presents an **ambiguous case** in temporal terms since conflicts between actors took place **during and after regime genesis**. Both regimes differ in their view on

²⁰ NAFTA Article 104 (and, for bilateral agreements, Article 104.1) is an example of such a priority clause. It states that in cases of inconsistency between NAFTA on the one hand, and CITES, the Montreal Protocol or the Basel Convention on the other hand, "the obligations of the latter prevail."

²¹ See above: Ch. III.1.1.

²² The Working Group considered the exceptions under GATT Article XX and rules of the 1969 Vienna Convention on the Law of Treaties (VCLT) as sufficient in order to avoid conflicts.

property rights to genetic resources. TRIPS seeks to strengthen and harmonize intellectual property rights systems, whereas the CBD reaffirms “that states have sovereign rights over their own biological resources” (4th preambular) and advocates the equitable sharing of benefits from utilization of genetic resources (Article 1).²³ This contradiction of rules has so far not led to disputes between states on the regime-external level, but instead, it has been the subject of several conflicts within regime organs. This goes back to the negotiation processes of both regimes: though the CBD had originally been advocated by several OECD countries (including the United States!), eventually, its content was strongly influenced by developing countries. On the other hand, the genesis of the TRIPS agreement in the course of the Uruguay Round has clearly been dominated by the U.S. and Western European countries (Rosendal 2003: 11f.). After negotiations had ended and both documents had entered into force, these regime-internal disputes were continued on an inter-institutional level: further regional conventions which run counter to TRIPS rules were adopted by the Andean Community (CAN) and by the Organization of African Unity (OAU) (Raghavan 2000); and the United States – being not a party to the CBD – voted against the CBD secretariat’s request for observer status during TRIPS conventions (Rosendal 2003: 13ff.).

III.2.2.2. Actors: Bureaucracies, States or Non-state Actors

When it comes to distinguishing which actors predominantly engage into manifest regime conflicts, the findings so far point at **bureaucracies** (in particular secretariats, specialized committees such as the CTE, and working groups) or **states**. This paper will thus roughly differentiate between manifest conflicts among bureaucracies and manifest conflicts among states, which is an analytical distinction, since in reality, such disputes can include both kinds of actors to a certain extent. Furthermore, though this goes beyond the focus of the underlying research project, one could well assume that also **non-state actors** such as NGOs and corporations play a significant role in such disputes (cf. Wapner 1996, 1998). In particular, non-state actors might be important in regime-external arenas, since as stakeholders (or shareholders) they are immediately concerned by contradictory rules, e. g. companies which through their behavior (e. g. import of goods prohibited by an MEA, but granted by WTO rules) trigger the manifestation of a latent conflict.

²³ As for more specific rules, TRIPS (Section 5, Article 27.1) calls for patent legalization in all technical fields including biotechnology: “patents shall be available for any inventions, whether products or processes, in all fields of technology, provided that they are new, involve an inventive step and are capable of industrial application.” TRIPS excludes plants and animals from patentability in Article 27.3, however stating that, until 2000 (developing countries until 2005), “members shall provide for the protection of plant varieties either by patents or by an effective *sui generis* subsystem or by any combination thereof”. This more or less implies the introduction of Intellectual Property Rights (IPRs) for plants.

The CBD has established a different type of property rights regime “where national sovereignty is introduced to counterbalance intellectual property rights” (Rosendal 2001: 107). More specifically, the CBD advocates the transfer of environmentally safe technology, including biotechnology and technologies covered by intellectual property rights, on “fair and most favorable terms” (Article 16.2). It also calls for the fair and equitable sharing of benefits arising from the utilization of knowledge (Article 8 and 12th preambular) from research and development (Article 15) and from biotechnologies (Article 19). Most remarkably, the CBD even explicitly refers to a potential regime conflict in its Article 16.5, stating that other IPR systems should “not run counter to [the convention’s] objectives”.

III.3. Overview of Types and Examples

Figure 2 combines the different types and subtypes along with the examples presented in this paper. Since I mostly have relied on samples of preceding projects in order to illustrate my typology, blank spaces in this chart should not yet be interpreted as a definite or predominant absence of respective cases. Some gaps might indeed be closed in the course of future empirical findings of the project. This is particularly to be expected for conflicts involving regional regimes.

However, other blank spaces might be harder to fill. This might hold true with respect to the striking absence of single-issue conflicts in the latent and direct types, which could be explained by the increase of coordination attempts among MEAs in recent years, often initiated by UNEP's Division of Environmental Conventions. For example, in August 2001, a Liaison Group was formed consisting of members of the secretariats of the FCCC, the CBD and the UN Convention to Combat Desertification (CCD). This group especially aims at avoiding negative results from overlapping rules (Hoffmann 2003: 23).

Another particularity revealed by the overview is the existence of only one case of a direct regime-external conflict, namely the dispute between Canada (referring to the NAFO) and Spain (referring to UNCLOS). Since this case wasn't even included in the samples of preceding studies, and since one can assume that disputes between states (especially when leading to respective settlement procedures of international courts or appellate bodies) should be discovered rather easily, it seems unlikely to expect many more cases for this subtype. One could carefully presume that such conflicts are anticipated and, thus, avoided by regime-internal conflicts either between bureaucracies or between states parties.

Furthermore, Figure 2 does not display all possible combinations of the criteria introduced in this paper. In some cases, this simply depends on their respective definition: for instance, the distinction between regime-internal and regime-external conflicts only makes sense for the type of direct manifest conflicts, i. e. for conflicts occurring between *actors*. In other cases, further graphical differentiations have simply been omitted for the purpose of avoiding over-complexity; for example, I have not further classified direct manifest conflicts according to the time of manifestation (during primary negotiations, after adoption, after entry into force, etc.) or to the relational geographical scope of the involved regimes (global-global, regional-regional, global-regional). In fact, the subtype "regional-regional" is completely missing in Figure 2, since the consulted samples only included one eligible case (DRD vs. EU Structural Funds).

Latent Conflicts			Manifest Conflicts							
			Direct Conflicts				Indirect Conflicts			
Single-issue	Cross-issue		Single-issue	Cross-issue			Single-issue	Cross-issue		
	Regional-Global	Global-Global		Regime-internal		Regime-external (= between states)	Regional-Global	Global-Global	Reg. - Global	Global-Global
				between bureauc.	between states					
	ICCAT <> GATT CCALMR <> GATT DRD <> SPS/TBT	Basel Convention <> GATT Montreal <> GATT CITES <> GATT FCCC/Kyoto <>GATT/GATS		FCCC/Kyoto <> ICAO/IMO EU Habitats Directive <> EU Structural Funds	CBD <> TRIPS Ramsar <> TRIPS CAN IPR Regime <> TRIPS OAU Model Law <> TRIPS	NAFO <> UNCLOS	OSPAR <> FCCC/ Kyoto	Montreal <> FCCC/ Kyoto CBD <> FCCC/ Kyoto		BSP <> GATT/SPS/ TBT PICCP <> GATT

Figure 2: Examples of International Regime Conflicts

IV. Assumptions about the Effect of International Regime Conflicts

Apart from its typological objectives, the project underlying this paper also aims at generating and testing theoretical assumptions about the consequences of regime conflicts. This chapter starts with general methodological and ontological reflections, before developing a number of hypotheses which shall be put to the test in the course of in-depth case analyses. However, given the current status of the project, this chapter will not include detailed methodological considerations, e. g. on causal mechanisms and particular indicators nor will it present any empirical results from ongoing case studies. Instead, this chapter addresses the essential question of how the *independent variable* (= regime conflicts) and the *dependent variable* (= relative reduction of effectiveness of the involved regimes) can be framed as observable variables and how to generally model the “avenue of explanation” (Van Evera 1997: 14) between both of them.

How does this connect to the preceding chapters? Clearly, such assumptions, let alone theoretically rich explanations, cannot be solely rooted in the typology presented above which was predominantly based on formal criteria such as time, place and degree manifestation. These criteria might help discover correlations between conflict types and conflict consequences, but they would fall short of deciphering the causal pathways in between. At best, they might infer simple explanations for the overall intensity of conflict consequences – e. g. when ascribing relatively harmless impacts to the latency of a conflict, or to the fact that it is taking place between two environmental regimes.

Nevertheless, this does not imply that the aforementioned typology is logically isolated from the following reflections. First of all and most importantly, the differentiation of conflict types is a key process to be undertaken before engaging into the testing of hypotheses in the course of comparative case studies. *One has to make sure which cases are both comparable and researchable.* Second, most of the distinctive criteria (e. g. conflict arena, conflict time and geographical scope) should be considered as *context variables* in a more complex research design. In other words: once the assumptions presented in Chapter IV.3 will be put to the test, these criteria should be similar across cases in order not to distort the results. Variation should clearly be restricted to the independent variables under scrutiny. This deems necessary with regard to the lack of specific theories on regime conflicts, i. e. as long as the particular impact of formal factors on the outcome of regime conflicts remains unknown.

IV.1. Modeling the Avenue of Causation

Literature on institutional interplay has come up with two diametrically different models in order to capture the complexity of regime interaction and its consequences.²⁴ As will be seen, the juxtaposition of both approaches reveals a deplorable trade-off between ontological accuracy on the one hand and analytical feasibility on the other. Based on Coleman (1990), the first **model by Gehring/Oberthür** (2003: 26ff., 2004: 6f.) suggests that regime interactions shall be

²⁴ The following concentration on the models of Gehring/Oberthür and Raustiala/Victor has been inspired by a keynote speech on “Institutional Interplay – Achievements and Challenges” given on December 4th, 2004 by Oran Young at the occasion of the 2004 Berlin Conference on the Human Dimensions of Global Environmental Change, held at Berlin, Germany.

disaggregated into an adequate number of bilateral cases of unidirectional causal pathways from a source to a target regime (see Figure 3). These pathways can be distinguished according to three respective points of impact to a target regime’s effectiveness: 1. the norms produced by the target regime (*output*), 2. the target regime’s behavioral effects on relevant actors (*outcome*) and 3. the ultimate effectiveness of the target regime with regard to its actual subject matter (*impact*) (Miles/Underdal et al. 2002: 10ff.; Underdal 2004). Once data collection has ended, these bilateral cases can be re-aggregated into causal chains or clusters.

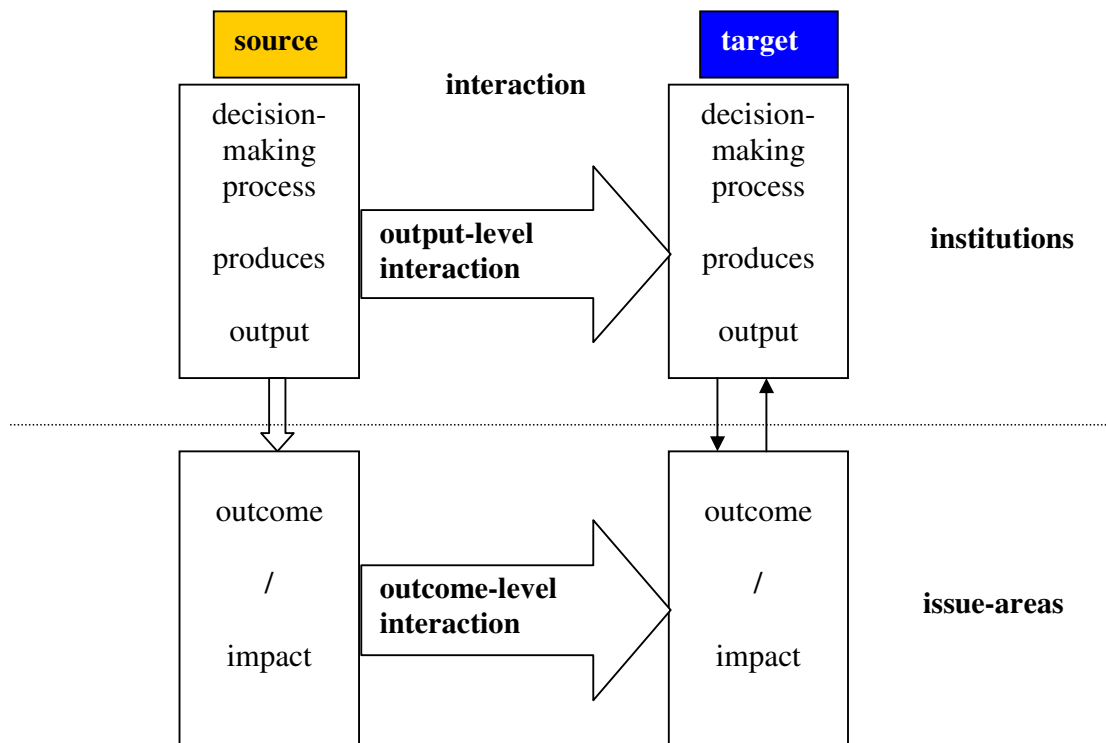


Figure 3: Gehring/Oberthür’s Disaggregation Model (Gehring/Oberthür 2003: 9)

However (even when disregarding the ontological pitfall of this “unit-level” approach which frames all types of institutions as pseudo-actors!), this approach misses the structural or *relational* aspect of regime-conflicts altogether: due to the primary disaggregation, the variables for the “mini-cases” are framed in a unidirectional way; thus, even a final re-aggregation (whose procedure still needs to be elaborated in further detail) would not avoid reductionist conclusions.

The alternative to Gehring/Oberthür’s reductionist approach is the far more real-world oriented **model of “regime complexes”** by Raustiala/Victor (2004). The authors do not start from a specific interaction among two or more regimes, but instead embark upon the ambitious mission to capture an issue area as a whole, accounting for all international institutions whose rules and consequences are related to this particular issue area. What is more, regime complexes also include activities on the domestic level to the extent that they have additional relevance for the international governance of the issue area under scrutiny (ibid.: 7ff.). There can be no doubt that such an

encompassing model, which takes into account both horizontal and vertical interplay, does justice to the complexity of institutional arrangements interacting at different levels. On the other hand, in view of the prospective workload as well as the availability of all relevant data, the proper application of this model seems hardly possible. Furthermore, such an approach is at odds with crucial methodological premises for theory-generation such as the parsimonious depiction of variables. In fact, complexity is hardly reduced at all such that although this model might produce compelling mappings of the institutional landscape, chances will be rather dim for translating such singular findings into general assumptions on institutional interplay.

In light of the aforementioned two models which – under reversed premises – are not suitable for the generation of hypotheses both accurate and generalizable, this project seems best located at a medium level or “third pole” between the two extremes of accuracy and feasibility, nonetheless borrowing some of their elements (see Figure 4). Starting from Gehring/Oberthür’s disaggregation model, it adopts the distinction between a regime’s output, outcome and impact. But the types of variables assigned to the two colliding regimes are different ones: the source regime (in the figure: “trade regime”) is conceived of as a restricting condition, or, in theoretical terms: a negative context variable to the effectiveness (= dependent variable) of the target regime (“environmental regime”, independent variable). In fact, modeled this way and understanding the effect of a colliding regime as an exogenous challenge, **the analysis could produce evidence with regard to the robustness or resilience of the target regime**, since robustness is defined as a regime’s “ability to withstand exogenous challenges without its effectiveness being diminished” (Hasenclever/Mayer/Rittberger 1996: 1; cf. Hasenclever/Mayer/Rittberger 2004).²⁵

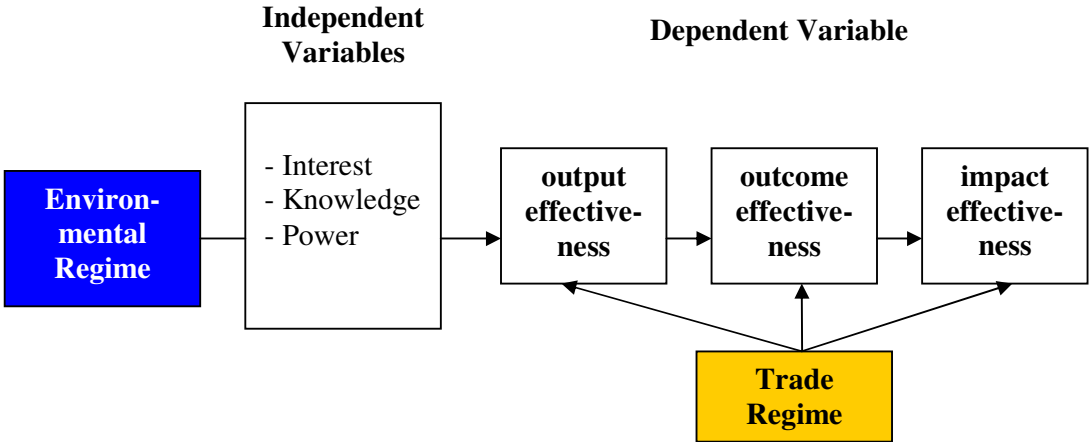


Figure 4: Reductionist Model of the Effects of a Regime Conflict

However, since it still adopts a “unit-level” regime-perspective, this model cannot circumvent reductionist fallacy; merely shifting around the types of variables from Gehring/Oberthür’s model does by no means avoid the blind spots of the disaggregation model, as the mutuality of impacts is still not accurately accounted for. Hence, exchanging the regime labels appearing in Figure 4 (“environmental regime”, “trade regime”) would model a reverse causality which nevertheless is

²⁵ Hence, a – nevertheless tautological – assumption could read: *In case of a regime conflict, the regime with the higher degree of robustness prevails.*

attributable to the very same constellation, since both regimes are negative context variables to each other's effectiveness. Thus, departing further from Gehring/Oberthür's reductionism, this project does not conceive of the mutual negative impacts of both regimes as separated and consecutive phenomena, but instead, following Raustiala/Victor, it frames the independent variable as an *interaction*, namely a *complex* of regimes causing a *relative* reduction of the effectiveness of the involved regimes. Therefore, unlike in the "all inclusive" model developed by Raustiala/Victor, this complex *only* contains the conflicting regimes, whereas it treats all further institutions, actors and processes related to the issue area(s) as potential context variables (Figure 5).²⁶

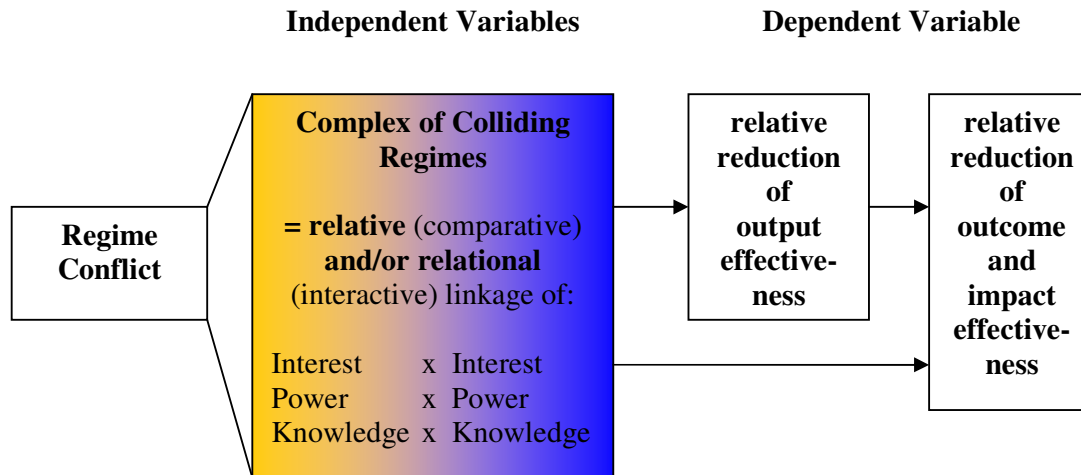


Figure 5: Interactive Model of the Effects of a Regime Conflict

IV.2. Dependent Variable: Relative Reduction of Regime Effectiveness

By "relative reduction", I mean the comparative (dis-)advantage of the affected regimes. This implies that – in a strict sense – two consecutive questions have to be answered, namely:

- 1. What is the **overall effectiveness-reducing consequence** of an international regime conflict?
- 2. What is the **distribution of this negative consequence** among the involved regimes?

Given the distinction between three levels of effectiveness (output, outcome and impact), the costs for the effectiveness of the involved regimes cannot be captured by a single concept. Instead, three different signposts – one for each level of effectiveness – would need to be installed.

²⁶ One might wonder of what particular use the term "regime complex" might be here. Isn't it merely a terminological substitute for "regime conflict", hence inferring no analytical gain whatsoever? As will be shown in the section on independent variables below, the answer to this question is clearly no. In fact, it is analytically crucial to distinguish the actual conflict, i. e. the technical overlap or inter-linkage of incompatible regimes, from the explanatory matrix it opens up, i. e. from the constellation of explanatory factors attributable to the involved regimes. *Thus, the terminological distinction between regime conflicts and conflict complexes is not a tautological one, but one between formal features (time, arena, degree of manifestation) and substantial factors; whereas the first ones have served as distinctive criteria for the classification of regime conflicts (and could prove useful for mapping correlations among themselves), only the latter can exert explanatory power by inter-linking substantial variables applied in (single!) regime theory (power, interest and knowledge).*

With regard to the most “distant” level, the *impact* (= problem-solving effectiveness) of the involved regimes, the analytical stakes are too high: concerning the considerable number of potential control variables which it takes to gain significant results about the problem-solving effectiveness of but one single regime, it is simply not possible to perform this sort of analysis for two or more regimes per case study in the course of a dissertation project.²⁷

As for the *outcome*-level, things don’t look much better. True, at first glance, a fairly narrow indicator such as **compliance** or “legal effectiveness” (= the degree to which contractual obligations are met by the states parties) (Young/Levy (1999: 4ff.)²⁸) insinuates analytical feasibility. More concretely, the concept seems suitable for before/after studies which ask to what degree compliance rates have deteriorated after the occurrence of an incompatibility with another regime? But whereas the detection of correlations seems fairly simple, an explanatory attempt would be confronted with a vast number of control variables – certainly less than in the case of an impact-level analysis, but the causal chains are still long enough to allow for various factors which could influence the outcome of the involved regimes, from external shocks to domestic changes in important member states.

Furthermore, only concentrating on outcome-related effects of regime conflicts could simply produce wrong results, since it might miss significant consequences of *manifest* regime conflicts. True, compliance rates might surely be an appropriate indicator when assessing the effects of *latent* regime conflicts, since such conflicts don’t imply any direct disputes and hence don’t produce any immediate interaction results. But when it comes to *manifest* conflicts, consequences might apply prior to the problem of compliance or non-compliance. Instead, manifest conflicts might already affect the *output*-level of regimes, especially when actors voluntarily alter this level while attempting to solve or tone down incompatibilities with another regime.

In order to clarify this thought, it is worth to embark upon a *brief excursion into different kinds of approaches which can be taken in order to manage international regime conflicts*.²⁹ The typology below (Figure 6) presents a preliminary overview which rests upon respective distinctions in

²⁷ This is not to deny the latest methodological progress in measuring the problem-solving effectiveness of regimes, especially through counter-factual approaches by Mitchell (2004) and the “Oslo-Potsdam solution” by Hovi/Sprinz/Underdal (2003, 2003a). One could think of applying such approaches in order to assess the impact of regime conflicts on the involved regimes, by determining the fictitious effectiveness of a regime in the absence of the regime(s) colliding with it. In fact, Sprinz (2003) has suggested a similar procedure for the analysis of regime interactions in one policy field, namely with the help of an extended Oslo-Potsdam solution. Yet, this certainly is easier said than done, since any potential mutual effect between the regimes would have to be singled out. But supposed this can be convincingly achieved, i. e. supposed the consequences of a regime conflict could be measured on the impact level: at the end of the (long!) day, one would still be left with the question of what has *caused* this particular result. And answering this question would now imply to travel the extra distance from the consequences at the impact level back to the outcome and output of the involved regimes.

²⁸ Altogether, Young/Levy (1999: 4ff.) distinguish between five possible approaches to the concept of regime effectiveness:

1. *Problem-Solving Approach* (= degree to which the problem that prompts regime creation is eliminated)
2. *Legal Approach* (= degree to which contractual obligations are met)
3. *Economic Approach* (= compliance [i. e. legal approach] + degree of economic efficiency)
4. *Normative Approach* (= degree of achievement of normative principles, e. g. fairness, participation, etc.)
5. *Political Approach* (= degree of causing changes in the behavior/interests of actors and in the policies/performances of institutions)

²⁹ The term “manage” seems to be more appropriate in this context since the respective mechanisms should not be confused with positive outcomes for the involved regimes. In fact, such approaches can at best keep the negative impact at zero for one regime (e. g. by granting it unconditional priority rights), which on the other side implies the maximum impairing of the effectiveness of the other regime(s). At worst, changes of core rules could entail the significant trimming of original treaty objectives. In short: the “solution” often is part of the problem; it might aggravate and perpetuate the negative effects, at least for one of the affected regimes.

international law literature (Neumann 2002: 317ff.; Pauwelyn 2003: 237ff.; cf. Young 1996: 18f.). The typology draws a general distinction between 1. strategies for long-term management, which are designed in order to anticipate and avoid any future conflict manifestations (sustainable or *ex ante*-management), and 2. measures which simply aim at solving a particular case after it appeared (singular or *ex post*-management). Furthermore, for each of these categories, strategies can be differentiated according to whether they immediately affect the wording or meaning of rules (legal approaches) or whether they involve the active coordination or cooperation between regime organs (political approaches).

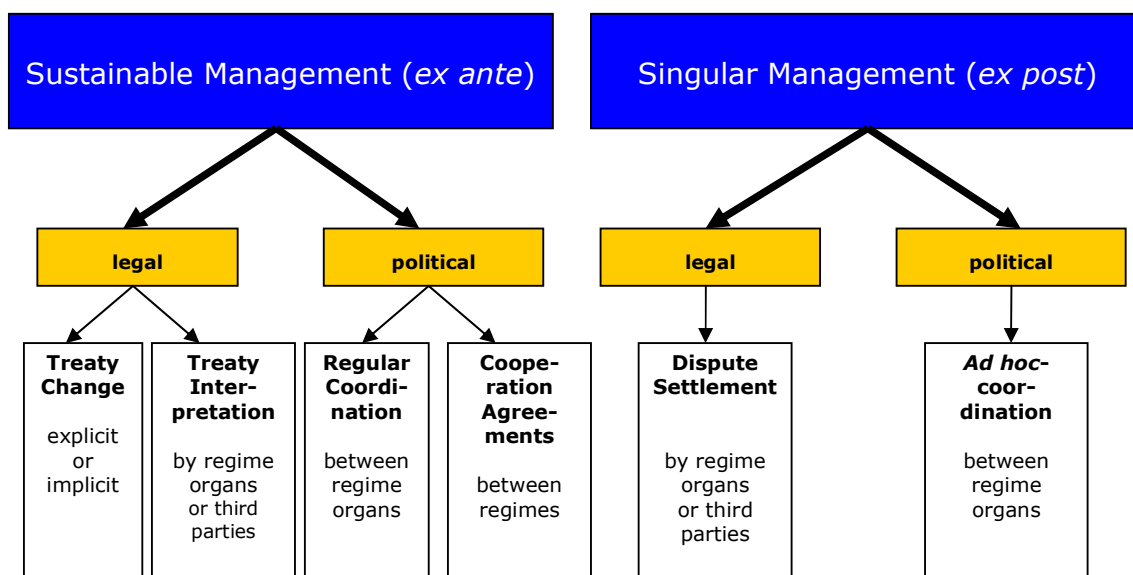


Figure 6: Solution Strategies for International Regime Conflicts

Legal approaches: The modification of regime rules can be considered as the most classical case of a long-term solution. Such treaty *changes* cannot only occur explicitly, e. g. by integrating or altering certain clauses, but also in an implicit way, e. g. through shifts in customary law.

Like direct changes, concrete *interpretations* of treaty rules can also provide sustainable harmonization between regimes, but they can also facilitate a singular settlement of a specific case. Treaty interpretations can be either decided by the respective majority of states parties or they can be provided by regime organs designed for dispute settlement. Moreover, if appealed to, third parties such as regime-external dispute settlement agencies (e. g. the ICJ), which refer to superordinate regulatory systems (e. g. the Vienna Convention on the Law of Treaties [VCLT]), might provide interpretations of overlapping rules (Neumann 2002: 343ff.).

Political approaches: The most common types of political long-term solutions are the coordination and the cooperation between regime organs. While the former only includes frequent consultations between single regime organs or some states parties, the latter comprises continuous and intensive relations between several regime organs – often institutionalized by cooperation agreements and accompanied by the establishment of special agencies such as the abovementioned Liaison Group of the CBD, the FCCC and the CCD (ibid.: 92f.).³⁰ Similar cooperation agreements exist between

³⁰ See above: Ch. III.3.

the International Labour Organization (ILO) and the Food and Agriculture Organization of the United Nations (FAO), or between the World Health Organization (WHO) and the United Nations Educational, Scientific and Cultural Organization (UNESCO). Unfortunately, the most ambitious attempt to date to reach a large-scale cooperation agreement between several trade and environmental regimes has failed; the respective initiative had been launched during the preparations of the 2002 World Summit on Sustainable Development (WSSD), but never materialized in the final documents of the summit.³¹

Unlike coordination or cooperation agreements, political short-term solutions don't exceed the level of *ad hoc*-coordination in order to settle singular conflict manifestations. Such approaches include the establishment of problem-oriented *ad hoc*-working groups and the consultation of experts across regimes (Young 1996: *ibid.*).

Coming back to the question of how to determine the dependent variable, the particular character of the results of the aforementioned approaches could present highly reliable indicators for the output-related consequences of a regime conflict. Such management approaches can imply significant changes to the design or the practice of a regime, hence materializing the *immediate* consequences of an incompatibility with another regime. This goes especially for *legal* strategies such as **regime change or interpretation**. These strategies could significantly modify or lead away from the original objectives – as stated in the preambles – of the respective agreements.³² On the other hand, *political* strategies of coordination and cooperation should prove less useful: unless they don't eventually lead to legal consequences, they might have more subtle results which would only eventually affect the performance of a regime.

The potential reliability of the indicator “regime change” is good news against the fears of analytical dead ends due to the complexity of the research object. The short causal chains between regime conflicts on the one side and the results of management approaches on the other side indeed increase the feasibility and the significance of case studies. However, these analytical benefits need to be put into perspective: in a strict sense, solution strategies are only applied to what has been termed manifest conflicts. Subsequently, any in-depth analyses of the consequences of regime conflicts are stuck in a **significance-representativity dilemma**: on the one hand, the results of studies of manifest conflicts are far more reliable, since less intervening factors have to be accounted for; on the other hand, as the overview of types and subtypes in Figure 2 has clearly indicated, it is latent regime conflicts which represent the major group of cases.

³¹ The Draft Plan of Implementation of the World Summit on Sustainable Development, which had been issued at the fourth PrepCom in Bali on 12 June 2002, contained the heavily bracketed Paragraph 122c. This paragraph stated that the international community should “promote initiatives to ensure the coherence and mutual supportiveness between the rules of the multilateral trading systems and the rules of multilateral environmental agreements.” It called for “further collaboration between on the one hand the WTO and on the other ILO, UNCTAD, UNDP, UNEP and other relevant agencies”. This harmonization should be “consistent with the goals of sustainable development”. Unfortunately, none of these several formulas ever was included into the final document.

Neumann (*ibid.*: 106f.) further distinguishes cooperation agreements based on whether they concentrate on *technical and administrative cooperation* (information exchange, scientific advice, etc.) or on *political cooperation* (observer status, project coordination, etc.). Agreements which intend to clarify the jurisdictional limits of overlapping regimes would fall into the latter category, i. e. the subtype of political cooperation agreements.

³² This again points to the abovementioned potential fallacy of outcome-related studies: Whenever a change of the core injunctions is occurring, the mere focus on compliance patterns could be simply misleading. Compliance rates might be stable or even increase due to a significant change of rules.

IV.3. Independent Variables: Relative and Relational Complexes of Colliding Regimes

I will introduce a couple of independent variables which are rooted in theories of (separate!) international regimes. More concretely, and following the suggestion of Olav Schram Stokke (2001: 11ff.),³³ these variables are gained by analytically linking the explanatory factors for regime effectiveness provided by these theories. With regard to these potential explanatory factors, I will take into account the **substantial and metatheoretical diversity of regime theories**: as shown by Hasenclever/Mayer/Rittberger (1997), on whose review of theories of international regimes the structure of this section will be based, regime theory cannot only be attuned to the use of rationalist independent variables such as power and interest, but also accounts for non-utilitarian explanations of regime formation and effectiveness.³⁴ In case of my research object, this rich supply of regime theories is well met by a demand for different explanatory approaches: given that regimes designed for different issue areas are under scrutiny here, it is obvious that different schools of thought – which score differently across empirical domains – should be taken into consideration and be tested against each other.

This section thus presents the deductive backbone of the project's theory-generating objective since it takes existing theories as building blocks for assumptions about the effect of regime conflicts. **The core variables of these theories can be linked in two ways**, namely a *relative* way (by simply comparing the particular dimensions of a variable and the subsequent causal pathways of the involved regimes) and, where possible, a *relational* way (by assuming the existence of an encompassing dimension of the respective variable resulting from regime interaction).

The remainder of this chapter will reveal that these two types of framing address the two consecutive aspects of the dependent variable (extent and distribution):

- **1. Relationally framed independent variables explain the overall extent of damage** (i. e. they explain the intensity of the regime conflict's outcome – but without predicting “winners” and “losers”).
- **2. Relatively framed independent variables explain the distribution of damage** (i. e. they explain which regime prevails).

³³ Unlike Stokke who distinguished between utilitarian, normative and ideational interplay, I will follow Hasenclever/Mayer/Rittberger (1997) in their distinction of regime theories according to their core variables, i. e. interest, power and knowledge.

³⁴ Exploring possibilities for a synthesis of rationalist regime theories, Hasenclever/Mayer/ Rittberger (2000: 12ff.) have suggested a contextualization approach, distinguishing between relative-gains dominated situations ('realist situations') and absolute-gains dominated situations ('neoliberal situations'). Furthermore, the authors explored the possibility of integrating weakly cognitivist variables, however not by extending the contextualization approach, but by supplementing rationalist theories. They offered two models: cognitive variables causally preceding or causally succeeding rationalist ones (ibid.: 26ff.).

A different contextualization approach has been developed by Zangl (1999: 47ff.) who assumes an oscillation between rationalist and what he calls “reflectivist” (*reflexivistisch*) logics of action. Sketching a possible contextualization of both logics, Zangl presupposes that the explanatory power of rationalist variables (as opposed to the explanatory power of reflectivist ones) increases with the growing stability of interests and decreases with growing institutional density.

In order to keep this section as short as possible, **I will not at all get into detail about the assumed causal pathways and operationalization of each consulted theory**, but will instead concentrate on the *relative* and/or *relational* framing of these theories' core variables.³⁵

Also note that in order to simplify the **form of the hypotheses**, I will depart from the usual structure of “A causes B” (in this case: “Complex of explanatory factors [opened up by a regime conflict] causes relative reduction of effectiveness...”). Instead, relatively framed hypotheses will mostly have the form: “In case of a conflict among international regimes, the one with a relative or relational advantage with regard to factor A will prevail.” Moreover, and also for simplicity's sake, the hypotheses will be phrased for conflicts involving (only) two regimes.³⁶

IV.3.1. Interest-based Variables and Hypotheses

IV.3.1.1. Situation Structure

The situation-structural approach interprets “different forms of regimes as collective responses to the functional requirements of different kinds of collective action problems” (ibid.: 45). Subsequently, proponents of this approach have mainly come up with assumptions about the likelihood of regime *formation* and regime *design*, but not about regime effectiveness (cf. Zürn 1992). This outlook puts the situation-structural approach rather out of focus for the research question of this project.

This notwithstanding, an attempt to apply this approach to the study of regime conflicts could start from its hierarchy of situation structures (1. assurance situations, 2. coordination situations, 3. collaboration situations, 4. suasion situations). Given the assumption that the regime-conduciveness of these situations decreases from 1 to 4, one is tempted to translate this hypothesis into one for regime effectiveness, presuming that the higher the willingness to establish a regime, the higher will be the actors' willingness to abide to it. Putting this intuitive thought in relative terms leads to a first *relative* hypothesis on the impact of regime conflicts, namely:

(I-relative) In case of a conflict among international regimes, the regime regulating the more regime-conducive strategic situation will prevail.

However, this all too quick “assumption” gets into straight conflict with another hypothesis stated by situation-structuralists, this time regarding the dependent variable of regime design.

³⁵ Nevertheless, in order to illustrate what I understand by relative and relational framing, in the upcoming sub-section on interest-based independent variables (Ch. IV.3.1.) I will slightly elaborate on the gaining of the respective variables and hypotheses. Moreover, I will consider to what extent the resulting hypotheses are suitable for testing in the course of my dissertation project – with regard to their potential operationalization, their explanatory power and the investigative effort they entail. On the other hand, the sections on power-based and knowledge-based variables will be kept rather short, by straightforwardly presenting further independent variables and hypotheses deduced from existing regime theories.

³⁶ Naturally, deduction from previous regime theories is not the only way to generate hypotheses. In addition, further explanatory factors and/or antecedent conditions can be detected exploratively, i. e. in the course of process analyses while performing case studies. However, at present, i. e. given that the project has not yet engaged into in-depth case studies, such assumptions cannot be presented here. This is not to say that a complementary inductive generation of hypotheses shall be ruled out for good. Quite on the contrary: induction is an indispensable analytical process when it comes to detecting “endemic” explanatory factors, i. e. factors particularly attributable to the phenomenon of regime conflicts (and which therefore can by no means be derived from the re-framing of existing theories on separate regimes).

Accordingly, the degree of legalization is indirectly proportional to the regime-conduciveness of strategic situations (i. e. increasing from 1 to 4). Hence, hypothesis I is diametrically at odds with any assumption linking the degree of legalization to the robustness of a regime. On the other hand, simply changing sides by now relying on the opposite hypothesis (i. e. the regime regulating the less regime-conducive strategic situation prevails) is not any less speculative. And indeed, such an assumption would clearly flunk most tests – e. g. take the example of the suasion game with the (currently defecting) “upstreamer” USA in case of the Kyoto Protocol (with high degrees of precision and obligation, but a low degree of rule enforcement). To sum up, the simple translation of situation-structural assumptions into hypotheses on regime effectiveness ends up substantially flawed.

Nonetheless, it would be just as wrong to doom the approach to be of no use whatsoever for the analysis of regime conflicts. As a matter of fact, referring to the second – i. e. *relational* – way of variable linkage presents a quite different picture: instead of treating the two colliding regimes as two different games, one can model the regime conflict as one single game. Thereby, I clearly don’t mean to treat regimes as actors in a strategic situation; this would be running counter to any rationalist understanding of the nature of institutions. However, a regime conflict opens up an inter-linkage of the games underlying the involved regimes; the result is a **new pay-off matrix** which might well alter the preference orderings of the actors operating in both regimes. Note that such inter-linkages of issues do not only take place in the context of regime conflicts as defined above. As Oran Young (1999a: 69) observes, “key players often act deliberately to forge links between activities that are not substantively interdependent.” As a consequence of an issue-linkage – be it produced by a deliberate package deal or by institutional conflict – actors can engage into “**forum shopping**”, i. e. they seek out the forum most favorable to their interests (Raustiala/Victor 2004: 8). More concretely, a linkage of two issues in general and a regime conflict in particular can be expected to produce a situation similar to the Battle of the Sexes, i. e. a situation structure with at least two Pareto-efficient equilibria, according to the (partially incompatible) objectives of the involved regimes.³⁷ However, game theory as such cannot fully predict *which* particular point at the Pareto-frontier is finally reached, i. e. which regime rather prevails. Rather, the overall game produced by a regime conflict might indicate chances for a sound settlement of the regime conflict. Likewise, modeling the overall game might help predict the extent of the total harm done to the effectiveness of the affected regimes.

(II-relational) The more regime-conducive the overall strategic situation established by a regime conflict, the lower is the overall reduction of the combined effectiveness of the involved regimes.

IV.3.1.2. Problem Structure

One possible problem-structural hypothesis can be derived from an approach distinguishing goods (regulated by conflicting regimes) according to their publicness, i. e. their degree of excludability and jointness of their supply. According to Olson (1971), a single actor’s willingness to pay for **public goods** is very low, since this actor cannot be excluded from the consumption of these

³⁷ However, at worst, the preference constellation of an issue-linkage situation could be a zero-sum game which cannot be captured at all by the following hypothesis.

goods.³⁸ Following this deductive approach, one can assume that actors will rather comply with regimes designed for private goods instead of abiding to environmental regimes which regulate public goods such as clean air or biological diversity, in other words:

(III-relative) In case of a conflict between a regime regulating a private good and a regime regulating a public good, the former will prevail.

Yet, one could argue that, at second glance, this assumption does not seem very helpful, since free trade could as well be classified as a public good.³⁹ However, there is an essential difference between the character of the public good “free trade” and environmental public goods. In order to point out this difference, one has to go beyond the classical understanding of the term given by Samuelson (1954) who had based his definition of public goods on the non-rivalry and non-excludability of benefits. Kaul/Conceição et al. (2003: 22f.) expanded this definition by distinguishing between goods which are public due to their innate properties (“pure public goods”, e. g. peace and security or environmental sustainability) and goods which are “*de facto* public” or “designed to be public” (e. g. basic education or health care). The publicness of the latter type of goods is the result of a social construction, for instance because special rules guarantee their non-exclusiveness (e. g. laws providing free access to education). Subsequently, there are different kinds of publicness, and, even more important, different roles that regimes can play with regard to publicness: in the case of “designed” public goods, regimes can be the major provider of the quality of publicness itself, as in the case of trade liberalization. Therefore, one can assume that with respect to designed public goods, the costs of free riding, i. e. non-compliance, for each actor are slightly higher (since such behavior endangers the non-exclusiveness of the good) than in cases where regimes regulate pure public goods such as biological diversity or ozone layer protection (because even non-compliance would not put the publicness of the good at stake). A hypothesis which takes this re-definition of public goods into account reads:

(IIIa-relative) In case of a conflict between a regime regulating a designed public good and a regime regulating a pure public good, the former will prevail.

Leading away from these relative problem-structural hypotheses, the question remains how problem structure can be framed in a *relational* way (i. e. beyond the mere comparison of the respective qualities of the regimes regulating them). One potential answer could be given by a reliable indicator which determines the extent of the **mutual intrusion of two issues**. By this, I refer to the fact that some environmental issues rather affect the major stocks and flows of some economies than others. For example, although some ozone-depleting substances which have been ruled out by the ozone regime had a number of significant uses, their prohibition did not pose major challenges to highly industrialized countries, partly due to the availability of moderately priced substitutes. “Greenhouse gas emissions, by contrast, arise from activities such as the combustion of fossil fuels and, thus, lie at the core of modern economies” (Young 1999a: 41).

A potential indicator for the intensity of two issues’ essential overlap is in fact provided by the colliding regimes themselves. One could assume that the type of mutual intrusion of two issues is

³⁸ For early adaptations of the free rider problem (in cases of collective action) to the issue of environmental protection, cf. Ostrom (1977) and Hardin (1968; “tragedy of the commons”).

³⁹ Such an assessment of free trade constituting a public good problem has been strongly refuted by Conybeare (1984: 8): “The reason is that free trade exhibits excludability and rivalry, and is fundamentally a problem of predatory income transfers [as is characteristic to PD situations], whereas the public good situation centers on the problem of introducing free riders to contribute to the supply of the public good.”

partially reflected in the **kind of injunctions about which these regimes get into conflict**. Using Oran Young's distinction between constitutive and operational interplay (Young 2002: 125ff.), one could ask: do regimes collide with regard to some major principles and core norms (= constitutive conflict), or do they rather collide about the mechanisms and means they apply in order to attain their objectives (= operational conflict)? If the latter is true, one might expect rather mild negative effects. Likewise, depending on the alternative tools at hand, such regime conflicts about means might show little propensity to become manifest at all.⁴⁰

(IV-relational) An operational conflict among international regimes is less harmful to the combined effectiveness of these regimes than a constitutive conflict.

IV.3.1.3. Degree of Legalization / Regime Design

Abbott/Keohane et al. (2000) distinguish three dimensions of legalization: obligation (i. e. the degree to which actors are bound by sets of rules), precision (i. e. the degree to which rules unambiguously define the conduct they require), and delegation (i. e. the degree of institutional setting, meaning the extent to which third parties have been granted authority to implement, interpret, and apply rules). The third dimension comprises the design of dispute resolution (e. g. a regime's sanctioning capacities or settlement procedures) and the mechanisms of rule making and implementation (e. g. decision-making procedures, monitoring capacities, etc.). With this three-fold approach, the authors take into account that relying on one of these dimensions alone does not lead to stable predictions. For example, regarding the dimension of obligation, Shelton (2003) has shown that soft law can meet similar or sometimes higher compliance rates than binding rules. Hence, including all three dimensions (in particular delegation which accounts for the strength of WTO rules due to the organization's dispute settlement mechanism) leads to the following assumption:

(V-relative) In case of a conflict among international regimes, the regime endowed with the higher degree of legalization will prevail.

Compared to most of the other hypotheses presented in this section, the independent variable of this assumption seems relatively easy to operationalize. A major problem is rather the continuity of the causal pathway all the way to the dependent variable. In other words: even when having found a correlation between a high degree of legalization and a high level of robustness of a regime, the ultimate explanatory leverage would still be missing. Findings could not exceed the counterfactual assumption that compliance rates would have been lower in the presence of a weaker regime.⁴¹

⁴⁰ This distinction draws directly from a valuable analytical framework for the study of institutional overlaps which has been developed by G. Kristin Rosendal (2001: 96ff.). Building – unlike the project underlying this paper – on Krasner (1983: 2) and his four-fold definition of international regimes (principles, norms, rules, procedures), Rosendal differentiates four types of divergence between regimes, depending on the (compatible or diverging) constellation of core and secondary norms as well as the relation of programmatic and regulatory rules across regimes. She expects overlaps between regimes with diverging core norms and diverging regulatory rules to have the highest scope for conflict, whereas programmatic incompatibilities should have higher potential for synergies.

⁴¹ A far more encompassing approach by Wettestad (2001) still faces the same problem. Though he clearly goes beyond the legal aspects of regime design, e. g. by taking into account the agenda structure or the role of the secretariat, not all gaps in the causal pathway between design and effectiveness can be filled. Nonetheless, this approach rightly stresses the importance of regime bureaucracies – a factor which will be further considered in the sub-chapter on knowledge-based variables.

IV.3.2. Power-based Variables and Hypotheses

Modifying **hegemonic stability theory** as it has been introduced by Charles Kindleberger (1973, 1981) leads to the following relative hypothesis:

*(VI-relative) In case of a conflict among international regimes, the regime meeting the (stronger) support by the outstanding economic and political power will prevail.*⁴²

Note that this relatively framed hypothesis has as well relational implications: the relational aspect here is the assumption of a hegemon possessing outstanding overall power *across* the issue areas regulated by the colliding regimes.

Furthermore, this variable is strongly linked to the geographical range and membership patterns of the affected regimes, since these factors determine the importance of particular parties or non-parties to the respective arrangements. Therefore, this approach does not only apply to familiar cases where the United States have not ratified major MEAs (e. g. the CBD or the Kyoto Protocol), but also to cases involving more peculiar regional regimes (e. g. Norway not being a member to the ICCAT). Thus, whenever a key player is party to only one of the regimes involved in a conflict and reveals a clear preference for the objectives of this regime, the regime has higher chances to succeed.

However, not every conflict might take place among regimes which include the (regional) hegemon (consider, for example, the indirect conflict between the CBD and the Kyoto Protocol). The existence of such cases insinuates the re-stating of the above hypothesis, namely in accordance with theories which treat so-called intermediate groups as a substitute for hegemonic leadership (Snidal 1985, cf. Hasenclever/Mayer/Rittberger 1997: 100ff.):

(VIa-relative) In case of a conflict among international regimes, the regime supported by the more powerful coalition of parties will prevail.

IV.3.3. Knowledge-based Variable and Hypothesis

The very last explanatory factor taken into consideration is borrowed from relatively recent research about the impact of bureaucracies on the effectiveness of international organizations and regimes (Barnett/Finnemore 1999, 2004). There might be objections to the classification of **bureaucratic leadership** as a constructivist or knowledge-based variable. Such objections have a point, since in meta-theoretical terms, bureaucratic leadership is indeed located between the lines: on the one hand, in line with the tenets of sociological institutionalism, it conceives of international organizations as independent actors who serve some social purpose or set of cultural values; on the other hand, in accordance with the principal-agent approach, bureaucratic actors might do so by following a rather rationalist logic of action, i. e. with the intention to maximize their interests by promoting their own autonomy and the effectiveness of the regime(s) under their auspices. Thus, the current subsumption of this factor as a knowledge-based variable should be considered a preliminary one.

⁴² Certainly, this assumption and, more importantly, the causal pathways it possibly entails, need further specification – e. g. by taking into account the debate on benevolent (Snidal 1985) and coercive leadership (Gilpin 1981, 1987) as well as more recent neo-realist tenets. However, as announced in the introduction of Chapter IV.3, this would be beyond the scope of this paper.

Though representing a fairly young research agenda which needs further clarification in view of its ontological positioning, bureaucratic leadership should not be disregarded when trying to explain the outcomes of international regime conflicts:

(VII-relative) In case of a conflict among international regimes, the regime administered by the more autonomous and goal-oriented bureaucratic leadership will prevail.

Indicators for bureaucratic leadership include the degree of formal independence of bureaucrats, their level of expertise and the overall organizational culture (internal communication, geographical representation of staff, appropriateness of hierarchy, etc.). Beyond this internal dimension of leadership, also the external performance should be taken into account, including – as suggested and applied by Andresen (2002) in his study on WHO leadership – focus on the 'reaching-out strategy', cooperation with other relevant international agencies and the related issues of external fund raising and high-level agenda setting.

IV.4. Applying the Framework against the Analytical Odds: Where to Go from Here?

Summing up the previous section, six hypotheses have been short-listed for the case analyses:

- **relatively framed hypotheses** (about the **distribution** of the conflict's negative impact among the involved regimes):
 - *designed public goods vs. pure public goods (IIIa)*
 - *degree of legalization (V)*
 - *distribution of power (VIa)*
 - *bureaucratic leadership (VII)*
- **relationally framed hypotheses** (about the **extent** of the overall negative impact):
 - *overall situation structure (II)*
 - *constitutive conflicts vs. operational conflicts (IV)*

This list clearly mirrors the complexity of the research object in two respects. First, the two-fold approach for framing the independent variables – i. e. in a relative and relational manner – has partially doubled the number of hypotheses derived from a specific theory. Second, the study of phenomena at the intersection of two issue areas – trade and environment – clearly calls for the comparative testing of different schools of thought who have earned some merits in at least one of these empirical domains in the past, i. e. knowledge-based theories for environmental issues and interest-based theories for economic issues.

This notwithstanding, it is obvious that not all of the above assumptions can be tested accurately in the further course of a dissertation project. Therefore, based on the criteria of operationalization, explanatory power and prospective workload, a selection will be made which will be put to test in the course of two in-depth analyses of manifest regime conflicts.

Furthermore, with regard to a reasonable number of case studies, the aforementioned significance-representativity dilemma⁴³ leaves no choice but to bid farewell to the ideals of ultimate representativity and “external validity” (Mitchell/Bernauer 1998). Hence, the hypotheses shall be

⁴³ See above: Ch. IV.2.

put to the test in at best (!) two in-depth case studies on direct manifest conflicts only. By combining structured and process analysis alike, some of the following assumptions shall then be tested while further antecedent conditions or even other explanatory variables might still be detected.

Conclusion

This paper has documented that international regime conflicts confront scholars with a highly complex research object, setting serious obstacles to any kind of systematic comparative analysis. Nevertheless, this should not deter, but rather attract scholars, since the potential theoretical and practical rewards are equally tempting. First of all, dealing with regime conflicts can significantly contribute to institutionalist theories, be it by framing and adapting some of the existing theories in order to lift them up to the inter-regime level, or by gaining additional and innovative theoretical assumptions about the genesis or consequences of regime conflicts. Second, not only with respect to theoretical merits, but also with regard to empirical findings, the topic has much to offer, since – apart from a couple of well researched cases – many regime conflicts have not yet been thoroughly analyzed, and a number of them might have not even been discovered.

Finally, and most importantly, the study of international regime conflicts can have immediate *practical* relevance regarding the question of effective global environmental governance. Some of the research findings could be translated into policy propositions regarding the harmonization of present regulative systems. In fact, as long as the existing environmental regimes will not be backed up by the (rather unlikely) establishment of a (powerful) World Environment Organization (cf. Biermann/Bauer 2004), their robustness depends on appropriate data and suggestions on how to actively handle their conflicts with other regimes. Put in pessimistic terms (from an ecological point of view), only the analysis of intersections and frictions between regimes can substantially confirm the intuitive assumption of relatively “weak” environmental regimes. Put in optimistic terms, the inter-regime approach might uncover supportive conditions for the strengthening of environmental regimes as well as for synergetic effects of free trade and global environmental protection.

References

- ABBOTT, Kenneth W., KEOHANE, Robert O., MORAVCSIK, Andrew, SLAUGHTER, Anne-Marie, and SNIDAL, Duncan 2000: *The Concept of Legalization*, in: *International Organization* 54:3, pp. 401-419.
- ANDERSEN, Regine 2002: *The Time Dimension in International Regime Interplay*, in: *Global Environmental Politics* 2:3, pp. 98-117.
- ANDRESEN, Steinar 2002: *Leadership Change in the World Health Organization: Potential for Increased Effectiveness?* FNI Report no. 8/2002 (Lysaker, Norway: The Fridtjof Nansen Institute).
- ANDRESEN, Steinar, and WETTESTAD, Jørgen 2004: *Case Studies of the Effectiveness of International Environmental Regimes*, in: Underdal, Arild, and Young, Oran R. (eds.): *Regime Consequences. Methodological Challenges and Research Strategies* (Dordrecht, Netherlands: Kluwer Academic), pp. 49-70.
- AXELROD, Robert 1984: *The Evolution of Cooperation* (New York, NY: Basic Books).
- BARNETT, Michael N., and FINNEMORE, Martha 1999: *The Politics, Power, and Pathologies of International Organizations*, in: *International Organization* 53:4, pp. 699-732.
- BARNETT, Michael N., and FINNEMORE, Martha 2004: *Rules for the World. International Organizations in Global Politics* (Ithaca, NY: Cornell University Press).
- BAUER, Steffen 2004: *Does Bureaucracy Really Matter? The Authority of Intergovernmental Treaty Secretariats*. Paper presented at the 45th Annual Convention of the International Studies Association, Montréal (Quebec), Canada, 17-20 March 2004.
- BERNAUER, Thomas, and RULOFF, Dieter 1999 : *Handel und Umwelt. Zur Frage der Kompatibilität internationaler Regime* (Opladen, Germany: Westdeutscher Verlag).
- BIERMANN, Frank, and BAUER, Steffen (eds.) 2004: *A World Environment Organization: Solution or Threat for Effective International Environmental Governance?* (Aldershot, UK: Ashgate).
- CHAMBERS, W. Bradnee (ed.) 2001: *Inter-linkages. The Kyoto Protocol and the International Trade and Investment Regimes* (Tokyo, Japan: United Nations University Press).
- CHAMBERS, W. Bradnee 2001a: *International Trade Law and the Kyoto Protocol. Potential Incompatibilities*, in: Chambers, W. Bradnee (ed.): *Inter-linkages. The Kyoto Protocol and the International Trade and Investment Regimes* (Tokyo, Japan: United Nations University Press), pp. 87-118.
- CHASEK, Pamela S. 2001: *Earth Negotiations. Analyzing Thirty Years of Environmental Diplomacy* (Tokyo: United Nations University Press).
- CHAYTOR, Beatrice, PALMER, Alice, and WERKSMAN, Jacob 2003: *Interactions with the World Trade Organisation. The Cartagena Protocol on Biosafety and the International Commission for the Conservation of Atlantic Tunas* [http://www.ecologic.de/download/projekte/850-899/890/in-depth/world_trade_organization.pdf] Rev. 2004-04-29.
- COFFEY, Clare, and RICHARTZ, Saskia 2003: *The EU Habitats Directive. Generating Strong Responses* [http://www.ecologic.de/download/projekte/850-899/890/in-depth/eu_habitats_directive.pdf] Rev. 2004-04-29.
- COLEMAN, James 1990: *Foundation of Social Theory* (Cambridge, MA: Belknap Press).
- CONYBEARE, John A. C. 1984: *Public Goods, Prisoners' Dilemma and the International Political Economy*, in: *International Studies Quarterly* 28:1, pp. 5-22.
- CZEMPIEL, Ernst Otto 1981: *Internationale Politik. Ein Konfliktmodell* (Paderborn, Germany: Schöningh).
- DAASE, Christopher 2004: *Interlocking Institutions and the 'War against Terrorism'*. Paper prepared for the Annual Convention of the International Studies Association, 17-20 March, 2004 in Montreal, Canada.
- DAHRENDORF, Ralf 1961: *Gesellschaft und Freiheit. Zur soziologischen Analyse der Gegenwart* (Munich, Germany: Piper).
- FRANCK, Thomas 1990: *The Power of Legitimacy Among Nations* (Oxford, UK: Oxford University Press).
- FRANCK, Thomas 1995: *Fairness in International Law and Institutions* (Oxford, UK: Clarendon Press).
- GEHRING, Thomas, and OBERTHÜR, Sebastian 2003: *Investigating Institutional Interaction. Toward a Systematic Analysis*. Paper for the 2003 International Studies Association Annual Convention,

- Portland, Oregon, 26 February – 1 March [http://www.ecologic.de/download/projekte/850-899/890/isa/isa_institutional_interaction_systematic_analysis.pdf] Rev. 2004-04-27.
- GEHRING, Thomas, and OBERTHÜR, Sebastian 2004: *Interaction between International Environmental Institutions. Causal Mechanisms and Effects*. Paper prepared for the Annual Convention of the International Studies Association, 17-20 March, 2004 in Montreal, Canada.
- GEHRING, Thomas, and OBERTHÜR, Sebastian 2004a: *Exploring Regime Interaction: A Framework of Analysis*, in: Underdal, Arild, and Young, Oran R. (eds.): *Regime Consequences. Methodological Challenges and Research Strategies* (Dordrecht, Netherlands: Kluwer Academic), pp. 247-280.
- GILPIN, Robert 1981: *War and Change in World Politics* (Cambridge, UK: Cambridge University Press).
- GILPIN, Robert 1987: *The Political Economy of International Relations* (Princeton, NJ: Princeton University Press).
- GRIECO, Joseph M. 1988: *Anarchy and the Limits of Cooperation. A Realist Critique of the Newest Liberal Institutionalism*, in: *International Organization* 42:3, pp. 485-507.
- GRIECO, Joseph M. 1990: *Cooperation among Nations. Europe, America and Non-tariff Barriers to Trade* (Ithaca, NY: Cornell University Press).
- GRIECO, Joseph M. 1993: *The Relative Gains Problem for International Cooperation: Comment*, in: *American Political Science Review* 87:3, pp. 729-735.
- GRIGORESCU, Alex 2004: *Cooperation and Competition Among International Organizations in the Promotion of Anti-Corruption Policies*. Paper prepared for the Annual Conference of the International Studies Association, Montreal, Canada, March 17-20, 2004.
- HAAS, Peter M. (ed.) 1992: *Knowledge, Power and International Policy Coordination*. Special Issue of *International Organization* 46:1 (Cambridge, MA: MIT Press).
- HAAS, Peter M. 1993: *Epistemic Communities and the Dynamics of International Environmental Cooperation*, in: Rittberger, Volker (ed.): *Regime Theory and International Relations* (Oxford: Clarendon Press), pp. 168-201.
- HAAS, Peter M. 2002: *UN Conferences and Constructivist Governance of the Environment*, in: *Global Governance* 8:1, pp. 73-91.
- HARDIN, Garrett 1968: *The Tragedy of the Commons*, in: *Science* 162, pp. 1243-1248.
- HARDY, Cynthia, and PHILLIPS, Nelson 1998: *Strategies of Engagement. Lessons from the Critical Examination of Collaboration and Conflict in an Interorganizational Domain*, in: *Organization Science* 9:2, pp. 217-230.
- HASENCLEVER, Andreas, MAYER, Peter, and RITTBERGER, Volker 1996: *Justice, Equality, and the Robustness of International Regimes. A Research Design* (Tübingen: Tübinger Arbeitspapiere zur internationalen Politik und Friedensforschung no. 25).
- HASENCLEVER, Andreas, MAYER, Peter, and RITTBERGER, Volker 1997: *Theories of International Regimes* (Cambridge, UK: Cambridge University Press).
- HASENCLEVER, Andreas, MAYER, Peter, and RITTBERGER, Volker 2000: *Integrating Theories of International Regimes*, in: *Review of International Studies* 26:1, pp. 3-33.
- HASENCLEVER, Andreas, MAYER, Peter, and RITTBERGER, Volker 2004: *Does Regime Robustness Require a Fair Distribution of the Gains from Cooperation. An Essay on the Methodology of Necessary Conditions as Applied to a Substantive Hypothesis Concerning the "Staying Power" of International Regimes*, in: Underdal, Arild, and Young, Oran R. (eds.): *Regime Consequences. Methodological Challenges and Research Strategies* (Dordrecht, Netherlands: Kluwer Academic), pp. 183-216.
- HERR, Richard A., and CHIA, Edmund 1995: *The Concept of Regime Overlap. Toward Identification and Assessment*, in: Davis, Bruce (ed.): *Overlapping Maritime Regimes. An Initial Reconnaissance* (Hobart, AUS: Antarctic CRC and Institute of Antarctic and Southern Ocean Studies), pp. 11-26.
- HOFFMANN, Hanna 2003: *The Joint Liaison Group between the Rio Conventions. An Initiative to Encourage Cooperation, Coordination and Synergies*, in: *UNU Work in Progress* 17:1, pp. 23-25.
- HOVI, Jon, SPRINZ, Detlef F., and UNDERDAL, Arild 2003: *The Oslo-Potsdam Solution to Measuring Regime Effectiveness. Critique, Response, and the Road Ahead*, in: *Global Environmental Politics* 3:3, pp. 74-96.
- HOVI, Jon, SPRINZ, Detlef F., and UNDERDAL, Arild 2003a: *Regime Effectiveness and the Oslo-Potsdam Solution. A Rejoinder to Oran Young*, in: *Global Environmental Politics* 3:3, pp. 105-107.

- KAUL, Inge, CONCEIÇÃO, Pedro, LE GOULVEN, Katell, and MENDOZA, Ronald U. 2003: *How To Improve the Provision of Global Public Goods*, in: Kaul, Inge, Conceição, Pedro, le Goulven, Katell, and Mendoza, Ronald U. (eds.): *Providing Global Public Goods. Managing Globalization* (Oxford, UK: Oxford University Press), pp. 21-58.
- KEOHANE, Robert O. 1989: *International Institutions and State Power. Essays in International Relations Theory* (Boulder, CO: Westview Press).
- KEOHANE, Robert O. 1993: *The Analysis of International Regimes. Towards a European-American Research Programme*, in: Rittberger, Volker (ed.): *Regime Theory and International Relations* (Oxford, UK: Clarendon Press), pp. 23-45.
- KINDLEBERGER, Charles P. 1973: *The World in Depression 1929-1939* (London, UK: Penguin Press).
- KINDLEBERGER, Charles P. 1981: *Dominance and Leadership in the International Economy. Exploitation, Public Goods, and Free Rides*, in: *International Studies Quarterly* 25:1, pp. 242-254.
- KING, Leslie A. 1997: *Institutional Interplay – Research Questions. A Report for the Institutional Dimensions of Global Change – International Human Dimensions Programme on Global Environmental Change* [<http://fiesta.bren.ucsb.edu/~idgce/publications/idgce/science/InstitutInterplay.pdf>] Rev. 2004-10-08.
- KOREMENOS, Barbara, LIPSON, Charles, and SNIDAL, Duncan 2001: *The Rational Design of International Institutions*, in: *International Organization* 55:4, pp. 761-799.
- KRASNER, Stephen D. 1983: *Structural Causes and Regime Consequences. Regimes as Intervening Variables*, in: Krasner, Stephen (ed.): *International Regimes* (Ithaca, NY: Cornell University Press), pp. 1-21.
- KRATOCHWIL, Friedrich V. 1989: *Rules, Norms, and Decisions. On the Conditions of Practical and Legal Reasoning in International Relations and Domestic Affairs* (Cambridge, UK: Cambridge University Press).
- MAYER, Peter, RITTBERGER, Volker, and ZÜRN, Michael 1993: *Regime Theory. State of the Art and Perspectives*, in: Rittberger, Volker (ed): *Regime Theory and International Relations* (Oxford, UK: Clarendon Press), pp. 391-430.
- MEARSHEIMER, John 1994: *The False Promise of International Institutions*, in: *International Security*, 19:5, pp. 5-49.
- MILES, Edward L., UNDERDAL, Arild, ANDRESEN, Steinar, WETTESTAD, Jorgen, SKJAERSETH, Jon Birger, and CARLIN, Elaine M. 2002: *Environmental Regime Effectiveness. Confronting Theory with Evidence* (Cambridge, MA: MIT Press).
- MITCHELL, Ronald B. 2004: *Quantitative Approach to Evaluating International Environmental Regimes*, in: Underdal, Arild, and Young, Oran R. (eds.): *Regime Consequences. Methodological Challenges and Research Strategies* (Dordrecht, Netherlands: Kluwer Academic), pp. 121-150.
- MITCHELL, Ronald B., and BERNAUER, Thomas 1988: *Empirical Research on International Environmental Policy. Designing Qualitative Case Studies*, in: *Journal of Environment and Development* 7:1, pp. 4-31.
- MÜLLER, Harald 1993: *Die Chance der Kooperation. Regime in den internationalen Beziehungen* (Darmstadt, Germany: Wissenschaftliche Buchgesellschaft).
- MÜLLER, Harald 1994: *Internationale Beziehungen als kommunikatives Handeln. Zur Kritik der utilitaristischen Handlungstheorien*, in: *Zeitschrift für Internationale Beziehungen* 1:1, pp. 15-44.
- NEUMANN, Jan 2002: *Die Koordination des WTO-Rechts mit anderen völkerrechtlichen Ordnungen. Konflikte des materiellen Rechts und Konkurrenzen der Streitbeilegung* (Berlin, Germany: Duncker & Humblot).
- OBERTHÜR, Sebastian 2003: *Interactions of the Climate Change Regime with ICAO, IMO, and the EU Burden-Sharing Agreement* [<http://www.ecologic.de/download/projekte/850-899/890/in-depth/unfccc.pdf>] Rev. 2004-04-29.
- OLSON, Mancur 1971: *The Logic of Collective Action* (Cambridge, MA: Harvard University Press).
- OSTROM, Elinor 1977: *Collective Action and the Tragedy of the Commons*, in: Hardin, Garrett, and Baden, John (eds.): *Managing the Commons* (San Francisco, CA: Freeman), pp. 173-181.
- PAUWELYN, Joost 2003: *Conflict of Norms in Public International Law: How WTO Law Relates to Other Rules of International Law* (Cambridge, UK: Cambridge University Press).
- PUTNAM, Robert D. 1988: *Diplomacy and Domestic Politics. The Logic of Two-Level Games*, in: *International Organization* 42:3, pp. 427-460.

- RAGHAVAN, Chakravarthi 2000: *Andean pact's new IPR regime shaped in US interests?*, in: Third World Network Online [<http://www.twinside.org.sg/title/andean.htm>] Rev. 2004-05-01.
- RAUSTIALA, Kal, and VICTOR, David G. 2004: *The Regime Complex for Plant Genetic Resources* (Los Angeles: UCLA School of Law Research Paper no. 03-19) [<http://ssrn.com/abstract=441463>] Rev. 2005-01-24.
- RISSE, Thomas 1999: *Identitäten und Kommunikationsprozesse in der internationalen Politik. Sozialkonstruktivistische Perspektiven zum Wandel in der Außenpolitik*, in: Medick-Krakau, Monika (ed.): *Außenpolitischer Wandel in theoretischer und vergleichender Perspektive: Die USA und die Bundesrepublik Deutschland* (Baden-Baden, Germany: Nomos), pp. 33-57.
- RISSE, Thomas 2000: *"Let's Argue!" Communicative Action in World Politics*, in: *International Organization* 54:1, 1-39.
- RITTBERGER, Volker, and ZANGL, Bernhard 2003³: *Internationale Organisationen. Politik und Geschichte* (Opladen, Germany: Leske + Budrich).
- RITTBERGER, Volker, and ZÜRN, Michael 1990: *Towards Regulated Anarchy in East-West Relations. Causes and Consequences of East-West Regimes*, in: Rittberger, Volker (ed.): *International Regimes in East-West Politics* (London, UK: Pinter Publishers), pp. 9-63.
- ROSENDAL, G. Kristin 2000: *The Convention on Biological Diversity and Developing Countries* (Dordrecht, Netherlands: Kluwer Academic).
- ROSENDAL, G. Kristin 2001: *Impacts of Overlapping International Regimes. The Case of Biodiversity*, in: *Global Governance*, 7:1, pp. 95-117.
- ROSENDAL, G. Kristin 2003: *Interacting International Institutions. The Convention on Biological Diversity and TRIPs – Regulating Access to Genetic Resources*. Paper for the 2003 International Studies Association Annual Convention, Portland, Oregon, 26 February – 1 March.
- ROSENDAL, G. Kristin 2003a: *The Convention on Biological Diversity and TRIPs. Different Approaches to Property Rights to Genetic Resources – Cause for Worry?* [http://www.ecologic.de/download/projekte/850-899/890/in-depth/convention_on_biodiversity.pdf] Rev. 2004-04-30.
- SAMUELSON, Paul A. 1954: *The Pure Theory of Public Expenditure*, in: *Review of Economics and Statistics* 36:4, pp. 387-389.
- SANDFORD, Rosemary 1994: *International Environmental Treaty Secretariats. Stage-Hands or Actors?*, in: Bergesen, Helge Ole, and Parmann, Georg (eds.): *Green Globe Yearbook of International Cooperation on Environment and Development 1994* (Oxford, UK: Oxford University Press), pp. 17-30.
- SANDFORD, Rosemary 1996: *International Environmental Treaty Secretariats. A Case of Neglected Potential*, in: *Environmental Impact Assessment Review* 16:1, p. 3.
- SANTARIUS, Tilman, DALKMANN, Holger, STEIGENBERGER, Markus, and VOGELPOHL, Karin 2004: *Balancing Trade and Environment. An Ecological Reform of the WTO as a Challenge in Sustainable Global Governance* (Wuppertal: Wuppertal Institut für Klima, Umwelt, Energie) [http://www.wupperinst.org/globalisierung/pdf_global/balancing_trade.pdf] Rev. 2004-04-30.
- SHELTON, Dinah 2001: *Environmental Rights*, in: Alston, Philip (ed.): *Peoples' Rights* (Oxford, UK: Oxford University Press), pp. 185-258.
- SHELTON, Dinah 2003: Introduction: *Law, Non-Law and the Problem of 'Soft Law'*, in: Shelton, Dinah (ed.): *Commitment and Compliance. The Role of Non-Binding Norms in the International Legal System* (Oxford, UK: Oxford University Press), pp. 1-18.
- SKJAERSETH, Jon Birger 2002: *Protecting the North-East Atlantic. One Problem, Three Institutions* [http://www.ecologic.de/download/projekte/850-899/890/in-depth/north-east_atlantic.pdf] Rev. 2004-04-29.
- SNIDAL, Duncan 1985: *The Limits of Hegemonic Stability Theory*, in: *International Organization* 39:4, pp. 579-614.
- SPRINZ, Detlef F. 2003: *Internationale Regime und Institutionen*, in: Hellmann, Gunther, Wolf, Klaus-Dieter, and Zürn, Michael (eds.): *Die neuen Internationalen Beziehungen. Forschungsstand und Perspektiven in Deutschland* (Baden-Baden, Germany: Nomos), pp. 251-273.
- STOKKE, Olav Schram 2001: *The Interplay of International Regimes. Putting Effectiveness Theory to Work*. FNI Report no. 14/2001 (Lysaker, Norway: The Fridtjof Nansen Institute) [<http://www.fni.no/pdf/01-14-oss.pdf>] Rev. 2004-10-07.

- UNDERDAL, Arild 2004: Methodological Challenges in the Study of Regime Effectiveness, in: Underdal, Arild, and Young, Oran R. (eds.): *Regime Consequences. Methodological Challenges and Research Strategies* (Dordrecht, Netherlands: Kluwer Academic), pp. 27-48.
- UNDERDAL, Arild, and YOUNG, Oran R. (eds.) 2004: *Regime Consequences. Methodological Challenges and Research Strategies* (Dordrecht, Netherlands: Kluwer Academic).
- VAN EVERA, Stephen 1997: *Guide to Methods for Students of Political Science*, (Ithaca: Cornell University Press).
- VELAZQUEZ, Jerry / PIEST, Uli 2003: *Introducing the UNU Inter-Linkages Initiative. Focusing on the Implementation of Sustainable Development*, in: *UNU Work in Progress* 17:1, pp. 1-3.
- VON HOMEYER, Ingmar 2002: *Deliberate Release Directive. Precautionary Interactions* [http://www.ecologic.de/download/projekte/850-899/890/in-depth/deliberaterelase_directive.pdf] Rev. 2004-04-29.
- VON MOLTKE, 2003: *Information Exchange and Observer Status. The World Trade Organization and Multilateral Environmental Agreements. Paragraph 31 (ii) of the Doha Ministerial Declaration* [http://www.ecologic.de/download/verschiedenes/2003/documents/paper_moltke.pdf] Rev. 2004-10-24.
- WALLANDER, Celeste A., and KEOHANE, Robert O. 1999: *Risk, Threat, and Security Institutions*, in: Haftdorn, Helga, Keohane, Robert O., and Wallander, Celeste A. (eds.): *Imperfect Unions. Security Institutions over Time and Space* (Oxford, UK: Oxford University Press), pp. 21-47.
- WAPNER, Paul 1996: *Environmental Activism and World Civic Politics* (Albany, NY: State University of New York Press).
- WAPNER, Paul 1998: *Governance in Global Civil Society*, in: Young, Oran R. (ed.): *Global Governance. Drawing Insights from the Environment Experience* (Cambridge, MA: MIT Press), pp. 65-84.
- WERKSMAN, Jacob 2001: *Greenhouse-Gas Emissions Trading and the WTO*, in: Chambers, W. Bradnee (ed.): *Inter-linkages. The Kyoto Protocol and the International Trade and Investment Regimes* (Tokyo, Japan: United Nations University Press), pp.153-190.
- WETTESTAD, Jørgen 2001: *Designing Effective Environmental Regimes. The Conditional Keys*, in: *Global Governance* 7:4, pp. 317-341.
- YOUNG, Oran R. 1989: *International Cooperation. Building Regimes for Natural Resources and the Environment* (Ithaca, NY: Cornell University Press).
- YOUNG, Oran R. 1989a: The Politics of International Regime Formation. *Managing Natural Resources and the Environment* in: *International Organization*, 43:3, pp. 349-376.
- YOUNG, Oran R. 1994: *International Governance. Protecting the Environment in a Stateless Society* (Ithaca, NY: Cornell University Press).
- YOUNG, Oran R. 1996: *Institutional Linkages in International Society. Polar Perspectives*, in: *Global Governance*, 2:1, pp. 1-24.
- YOUNG, Oran R. (ed.) 1999: *The Effectiveness of International Regimes. Causal Connections and Behavioral Mechanisms* (Cambridge, MA: MIT Press).
- YOUNG, Oran R. 1999a: *Science Plan for the Project on the Institutional Dimensions of Global Environmental Change* [<http://fiesta.bren.ucsb.edu/~idgpc/publications/Plan-rev.pdf>] Rev. 2005-01-24.
- YOUNG, Oran R. 2002: *The Institutional Dimensions of Environmental Change. Fit, Interplay, and Scale* (Cambridge, MA: MIT Press).
- YOUNG, Oran R. 2002a: *Are Institutions Intervening Variables or Basic Causal Forces? Causal Clusters vs. Causal Chains in International Society*, in: Brecher, Michael, and Harvey, Frank P. (eds.): *Millennial Reflections on International Studies*, (Ann Arbor, MI: University of Michigan Press), pp. 176-191.
- YOUNG, Oran R., and LEVY, Marc A. 1999: *The Effectiveness of International Environmental Regimes*, in: Young, Oran R. (ed.): *The Effectiveness of International Regimes. Causal Connections and Behavioral Mechanisms* (Cambridge, MA: MIT Press), pp. 1-32.
- ZANGL, Bernhard 1999: *Interessen auf zwei Ebenen. Internationale Regime in der Agrarhandels-, Währungs- und Walfangpolitik* (Baden-Baden, Germany: Nomos).
- ZÜRN, Michael 1992: *Interessen und Institutionen in der internationalen Politik. Grundlegung und Anwendungen des situationsstrukturellen Ansatzes* (Opladen, Germany: Leske + Budrich).

ZÜRN, Michael 1993: *Problematic Social Situations and International Institutions: On the Use of Game Theory in International Politics*, in: Pfetsch, Frank R. (ed.): *International Relations and Pan-Europe. Theoretical Approaches and Empirical Findings* (Münster, Germany: Lit), pp. 63-84.