

To: Participants, Nested and Overlapping Regimes Conference

From: David Victor

Re: Nested and overlapping regimes related to energy markets

Date: February 9, 2006

One of the items on Sophie and Karen's bibliography for this meeting is a piece that Kal Raustiala and I wrote on "regime complexes." I attach a recent paper—a very early draft, co-authored with Sarah Joy—that applies the concept of a "regime complex" to the case of international cooperation on matters related to energy. The final section summarizes the main arguments and may be worth reading.

In this memo I focus on the lessons learned from the experience of writing this paper on the regime complex in the energy field. I make three arguments.

#### The Sources of Nested and Overlapping Commitments: General Comments

My impression is that there are, broadly, four different types of overlapping commitments and nested commitments. First and most straightforward are classic nested rules. These are cases where specific rules operate inside a broader (hierarchical) framework. These cases are unlikely to create any actual conflicts in rules; often the rules arise within the same legal regime, such as particular protocols that exist as subsidiary agreements to a framework convention, technical codes that exist within a broader cooperative agreement, and so on. This could be an interesting category analytically. Such rules might "matter" because they are easier to tailor to particular interests and membership—the games are easier to play because transaction costs are lower. For the most part I have not looked closely at these cases, and I will set them aside for the rest of this memo.

Second, there may be cases where the search for negotiation efficiency produces conflicts or inconsistencies between legal regimes. Regional or bilateral trade pacts may be examples of this type. The parties aim to achieve some gains from trade that arise by discriminating against outsiders, which could be contrary to other agreements such as the more general provisions in the WTO. There are some examples of this type related to energy—often arising in times of crisis. During the oil aftershocks of the 1979 Iranian revolution countries widely disregarded the collective agreements they had made to share oil and to coordinate their interventions in the market. Some of those made expedient arrangements among smaller groups that conflicted with the broader rules. That this happened is hardly surprising for at least two reasons. First, the exact implications of the broader rules, which were barely two years old, was not clear. Second, it was not feasible to monitor behavior, and thus even in the absence of formal enforcement

procedures (which themselves did not really exist), governments were flying blind about their own behavior and the behavior of others.

Third, there may be cases of inconsistency by design. Kal and I found a few examples of that in the plant genetic resources regime—instances where well-organized governments explicitly sought to adopt conflicting rules that established an alternative venue to push their interests. The keen interest in “forum shopping” reflects a theoretical concern with these kinds of rules—in the case of forum shopping, the active seeking of favorable rules within a sea of conflicting obligations. In the energy area I see no evidence of this. While it is especially difficult to theorize from the absence of observations, my sense is that this lack of forum shopping—when other areas of international cooperation seem to be replete with examples of forum shopping—may reflect two factors at work:

1. Overt efforts to create conflicts and to engage in forum shopping seem to arise especially on topics where much international cooperation is about posturing and symbolic benefits. That might explain why such behavior is especially evident in human rights, in some areas of environmental protection, and on the most symbolic (and emotive) aspects of plant genetic resources. They don't seem to arise in the areas of economic cooperation that I have examined. In some areas of economic cooperation there are symbolic benefits to be obtained, but the ratio of symbolic effort to productive coordination rarely seems to approach the level seen in environmental issues.
2. The density of existing rules related to energy is much lower than in other areas of international cooperation—such as in the environment and in human rights. Thus the sheer opportunity to create conflicting rules is lower. The root cause of this lower density may be the same as point #1 above—where there is no symbolic benefit to creating rules for the sake of rules, the density of such rules stays lower.

Fourth, overlapping and conflicting commitments may arise by accident. By and large, that is the history of the plant genetic resources regime. And the attached essay on energy suggests that accidental conflicts arise in this sector as well. Regimes are created, originally, to solve particular problems that require collective action. Then, with time and experience, things change. New technologies and priorities emerge, which shift the priorities for cooperation. Concerning trade in natural gas from the Soviet Union to Western Europe, new countries and identities emerged when the Soviet system collapsed. These new situations can give rise to conflicts. All else equal, the higher the density of existing commitments the more likely it is that such conflicts will arise autonomously. In the area of energy, we have also suggested that such conflicts are particularly prone to arise because the demands that are placed on the energy system—such as demands for energy security and, especially, related to environmental protection (which itself grows as a function of income and the spread of environmental values)—seem to multiply with time.

### Evolution at the “Joints”

Kal and I advanced the argument that where there are partially overlapping commitments—what we called “regime complexes”— evolution would tend to occur at the “joints” between regimes.

As the rules become more dense, conflicts between individual rule sets (what we called “elemental regimes”) would become more likely. And those conflicts would become magnets for diplomatic effort for at least two reasons. First, especially for regimes that affect interests, conflicts are likely to cause harm to at least one party that will then find an incentive to fix the problem. Second, diplomats need help focusing their agendas because they constantly face an over-supply of things to do; an obvious disorder in the legal world screams for attention.

In the energy case we make a similar argument, but the style of evolution is a lot more interesting. Two broad coalitions have emerged in the oil markets—one of users (the International Energy Agency, or IEA) and the other of suppliers (OPEC). The coalitions’ interests were originally conceived as quite opposite—indeed, OPEC gained strength through an explicitly anti-western embargo, and the IEA was conceived in the context of an “us versus them” mentality in key oil importers. With time, key members of each regime have discovered areas of common interest. For example, IEA has coordinated informally and tacitly with OPEC in times of crisis because, usually, OPEC is better able to deliver additional supplies to the world market. IEA, OPEC and key governments have all encouraged a recent effort to improve the quality of data about oil markets. Formal institutional outcomes from these efforts include a “producer-consumer dialogue” that appears to have played some modest role in dampening speculation in the current tight market as well as the Joint Oil Data Initiative (JODI).

A new problem is arising at the intersection between gas trading relationships in Europe (which are backed mainly by bilateral treaties between Russia and major gas importers) and the new efforts to control CO<sub>2</sub>, the leading cause of global warming. Until a few years ago most studies expected that tightening the screws on CO<sub>2</sub> would lead to a shift from coal (which is carbon heavy) to gas (which emits less than half the CO<sub>2</sub> per unit of energy). Now gas prices are high, and the recent stoppages on Russia’s main gas export pipelines have raised fears that gas supplies are insecure. Earlier in the 1990s there had been an attempt to normalize investment and control over gas pipelines through the Energy Charter Treaty, but Russia refused to join that agreement (as it might have threatened Gazprom’s monopoly). By contrast, there is a governing set of rules on CO<sub>2</sub> (the Kyoto Protocol). Greater success on CO<sub>2</sub> will require, it seems, success also with assuring a greater and more secure supply of gas—interactions that were not high on the list of policy priorities a few years ago are now urgent matters.

#### A Residual Category: Some Additional Observations

I close with four other observations of overlapping rules. None fits neatly into any category but could be important for our workshop and any subsequent research in this area.

First, we probably need to pay closer attention to what we mean by “rules.” In the energy business, what ultimately matters is investment because nearly all energy projects require enormous amounts of capital and have long time horizons. That makes investors wary because they fear that the bargains they strike around their investments will become obsolete once they have sunk the capital. To help address this problem, hundreds (perhaps thousands) of bilateral agreements have emerged in the last two decades—so-called bilateral investment treaties (BITs). These arrangements have provided the governing law for many of the toughest disputes over

energy investment. For example, the workout around Enron's Dabhol power plant in India has been eased by the presence of a BIT between Mauritius (the host country for most of the western investors) and India. Many of these arrangements probably fly below the radar screen of regime theorists who are trained to look for multilateral agreements and evidence of government action. Although BITs are negotiated by governments, it is their invocation by private investors that gives them real authority. The result is that a body of law and expectations is arising around the practice of investors; that, in turn, is affecting one of the largest areas of FDI and also the choice of technologies.

Second, there may be a problem of selection bias in the types of conflicts between rules that attract the attention of scholars. Conflicts are usually easy to observe. Yet an impartial reading of the full canon of relevant treaties and procedures at work in a given area might reveal a large number of apparent conflicts—and only a small set actually flares. To the extent that is true, at least two factors may be at work. First, there may be many rules and norms that don't matter, but the impartial observer may find it difficult to determine which they are *ex ante*. To my knowledge, we don't have good theories about "junk law" (the equivalent of "junk DNA"); in some areas of cooperation, again perhaps those laden with symbolic politics, junk law could dominate the canon. Second, the process of evolution "at the joints" might be steered to an even greater degree than we had originally thought—by focusing attention on a subset of potential conflicts.

Third, the organizers asked each memo writer to image a hypothetical world in which all intermediary rules and institutions are swept away, leaving just one omnibus take-it-or-leave-it agreement. That world is really difficult to imagine because it would be exceptionally difficult to negotiate and sustain an agreement that provides meaningful rules for all aspects of energy markets. Indeed, the energy field has an example of one such attempt: the "Energy Charter Treaty." This effort includes some participation from all European countries and now many others elsewhere in the world. It was originally intended to engage East European and former Soviet nations in a larger collective management effort that would accelerate investment and bind them to the West. But with time it became a forum to discuss all issues around energy. It has been a disaster. The key member in all this, Russia, has refused to join because the original treaty obligations were not carefully tailored to meet Russian interests. (And as the effort has become woollier the job of tailoring has been tougher.) And the sheer complexity of all the other issues has made the ECT just a talk shop while real cooperation focuses elsewhere or nowhere at all.

Fourth, no doubt in all this there is a theory of the optimal integration. For some issues, adding more parties and linkages yields externalities that make cooperation easier. For others, the expansion in geographical and topical scope leads to an exponential increase in the need for costly diplomatic engineering. I have not worked further on that theory, but perhaps we could profitably do so at the workshop. My hunch is that the key factors will include not just the structure of the issue and the linkages but also, crucially, the ways that uncertainty affects bargaining. When countries are highly risk averse and uncertainties are high, adding more topics and countries probably quickly leads to chaos because each country will accept only the agreement that robustly meets its interests under the worst case scenario. Where interests are well-known and outcomes can be understood then the "negotiation arithmetic" of adding more

countries and issues probably leads to profitable outcomes. Working through the factors that explain when omnibus agreements will achieve success may also help us to identify when more fragmented arrangements—with all their overlapping and nested rules—are likely to persist.