ENVIRONMENTAL AGREEMENTS, NON-STATE ACTORS, AND THE KYOTO PROTOCOL: A "THIRD WAY" FOR INTERNATIONAL CLIMATE ACTION?

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1. Introduction

Then I was standing on the highest mountain of them all, and round about beneath me was the whole hoop of the world. And while I stood there I saw more than I can tell and I understood more than I saw; for I was seeing in a sacred manner the shapes of all things in the spirit, and the shape of all shapes as they must live together like one being.¹

Native American tribes of the North American Plains hold the hoop as one of their most sacred symbols. To these first nations, the hoop represents the complete relationship between all humans and their natural surroundings; humans are not viewed as Nature's conqueror, but its steward. Of course, it is unlikely that citizens of modern industrial nations will ever adopt the Native American philosophy in its entirety. But an analogy emerges from the Native vision of the natural world that could be helpful as the international community struggles to respond to the threat of global climate change. That is, to solve a problem of such scale, rooted as it is in a century of human activity, the solution must run as broad and as deep as the problem. It must, like Nicholas Black Elk's hoop, represent the relationship between humans and nature on all levels.

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¹ NICHOLAS BLACK ELK, AS TOLD THROUGH JOHN G. NEIHARDT (FLAMING RAINBOW), BLACK ELK SPEAKS: BEING THE LIFE STORY OF A HOLY MAN OF THE OGLALA SIOUX 33 (Twenty-First Century ed., Univ. of Neb. Press 2000) (1932).

How does this relate to the Kyoto Protocol, the controversial, international greenhouse gas reduction treaty, and to the broader international climate regime? First, the Protocol is too narrow—it does not include the entire spectrum of parties necessary to achieve drastic cuts in greenhouse gas emissions. In particular, the Protocol does not reach the world's biggest emitter of greenhouse gases, the United States. Second, the Protocol does not extend deeply enough into the fields of human behavior to have a sustainable impact. In order to be truly effective, the international climate regime must change deeply ingrained commercial behavior. The only way to expand the breadth and depth of the climate regime is to bring non-state actors (multinational corporations and non-governmental organizations) into the process, and to use new tools (based on the ways that private individuals interact) to affect behavior at all levels.

Despite the political and diplomatic uproar since the Bush Administration rejected the Kyoto Protocol in 2001, a global consensus is developing around the scientific basis for climate change. Even though political pressure has forced the Bush Administration to attempt to reduce emissions independently of the Kyoto Protocol,² and the United States may soon introduce more stringent standards,³ these attempts are cold comfort as the Protocol's standards were significantly watered down in an attempt to woo American participation. Thus, meeting the Protocol's standards will do little to halt global climate change.

The chief problem with the Kyoto Protocol is not, as the Bush Administration has argued, its fixed emissions caps—even many of the Administration's supporters in business support binding emission targets, even if only out of recognition that they are inevitable.⁴ Rather, the Protocol's overwhelming deficiency is that

² See Andrew C. Revkin, U.S. is Pressuring Industries to Cut Greenhouse Gases, N.Y. TIMES, Jan. 20, 2003, at A1 (describing the Bush Administration's seeking voluntary emissions reduction commitments from industries).

³ See New Players on Global Warming, N.Y. TIMES, Jan. 15, 2003, at A20 (discussing emissions reduction legislation introduced in the U.S. Senate by Senators McCain and Lieberman).

⁴ See Revkin, supra note 2; see also Darcy Frey, How Green is BP?, N.Y. TIMES MAG., Dec. 8, 2002, at 98 (describing British Petroleum's ("BP") efforts to reduce emissions). A number of businesses, including IBM, Intel, Alcoa, Lockheed Martin, Boeing, Shell, and others, have joined the Pew Center on Global Climate Change's Business Environmental Leadership Council, which proclaims its acceptance of "the science and environmental impacts of climate change" and describes the Kyoto agreement as a "first step" in addressing the issue. Pew

it relies solely on individual nation-states to implement and enforce measures to reduce emissions, necessitating participation by a large number of countries and the political will of member countries to make the necessary policy choices. As has been made clear by the U.S. Administration's hostility to the Kyoto Protocol and by the history of the negotiations themselves, reliance on nations to address local emissions is subject to national and local politics that often shift with electoral changes.

Non-state actors are now as important as nations in international environmental issues, but the current international climate change regime relies exclusively on national governments to implement emissions-reduction regulations. By adding a system of agreements to its legal toolkit that is incentivized and voluntary, but also binding and enforceable, the Kyoto regime can do an end run around the shifting politics of the United States and other countries, and deal directly with the actors most responsible for greenhouse gas emissions. To ensure that such agreements do not fall victim to corporate lobbying, while at the same time making the pacts palatable to corporate boards, the regime must also involve, and bind, non-governmental organizations ("NGOs").5

Section Two of this Comment begins with an introduction to the familiar global climate change story, its science, and a history of the international negotiations that led to the Kyoto Protocol. Section Two also describes the Protocol itself and other international regimes aimed at the issue of climate change.

Section Three explains the politics surrounding global climate change and argues that the current Protocol, with its reliance on sovereign nation-states to reduce emissions, is doomed to fail. The Section then describes the role played in climate change issues by non-state actors, including multinational enterprises ("MNEs"),

Center on Global Climate Change, Business Environmental Leadership Council, at http://www.pewclimate.org/companies_leading_the_way_belc/index.cfm (last visited Sept. 28, 2003). Over seventy companies, including such multinational giants as Coca-Cola, Sunoco, Ford, General Motors, and Bank of America, have endorsed the Center for Environmentally Responsible Economies ("CERES") Principles, a set of environmental principles developed in an alliance with non-profit environmental groups and foundations. CERES Principles Endorsing Companies, Coalition for Environmentally Responsible Economies, at http://www.ceres.org/about/endorsing_companies.htm (last visited Sept. 28, 2003).

⁵ For purposes of this Comment, the Author uses the term "NGO" solely to describe green, or environmental, groups, and include business coalitions in terms referring to their constituent members (i.e., corporations, business, or industry).

and environmentalist NGOs.

Section Four reviews various types of voluntary environmental agreements used in the United States and the European Union. These agreements include environmental management systems such as the International Standardization Organization's "ISO 14000" program ("ISO 14000"),6 the European Union's Eco-Management & Audit Scheme ("EMAS"),7 the Coalition for Environmentally Responsible Economies' CERES Principles ("CERES Principles"),8 voluntary commitments pursued by the Bush Administration,9 and environmental contracts.¹¹¹ This Section also discusses the role currently played by NGOs in private regulatory enforcement schemes.

Finally, Section Five argues that binding, enforceable, and voluntary agreements can be a mechanism for positive inclusion of multinational corporations in the climate regime. However, this is

⁶ ISO 14000 Information Center [hereinafter ISO 14000 website], *at* http://www.iso14000.com/main.htm (last visited Sept. 24, 2003). The International Standards Organization ("ISO") is a global group that sets standards for products and businesses, such as setting a standard size for compact discs. *Id*. The ISO has also created standardized management systems, including the environmental management system, ISO 14000, described more fully below. *Id*.

⁷ Eco-Management and Audit Scheme [hereinafter EMAS website], *at* http://europa.eu.int/comm/environment/emas/index_en.htm (last visited Sept. 24, 2003). EMAS is similar to the ISO 14000 system in that it is a voluntary program; it differs, as will be more fully explained later in the text, in that it requires auditing and disclosure of environmental data that ISO 14000 does not. EMAS website, Executive Summary, *at* http://europa.eu.int/comm/environment/emas/about/summary_en.htm (last visited Sept. 24, 2003); ISO 14000 website, *supra* note 6.

⁸ CERES Network for Change, Our Work, CERES Principles [hereinafter CERES website], at http://www.ceres.org (last visited Sept. 24, 2003). As explained below, CERES, began life as the Valdez Principles, a set of corporate ideals developed in response to the Exxon Valdez oil spill in Prince William Sound, Alaska. CERES website, About Us, History, at http://www.ceres.org/about/history.htm (last visited Oct. 30, 2003).

⁹ For a description of the Administration's voluntary "ClimateVISION" program, see the Environmental Protection Agency ("EPA") fact sheet, *at* http://www.epa.gov/newsroom/ factsheet_021203.htm (last visited Sept. 24, 2003).

¹⁰ See generally ERIC W. ORTS & KURT DEKETELAERE, Introduction: Environmental Contracts and Regulatory Innovation, in Environmental Contracts: Comparative Approaches to Regulatory Innovation in the United States and Europe (Eric W. Orts & Kurt Deketelaere eds., 2001) [hereinafter Orts & Deketelaere] (discussing environmental contracts as one way to reform environmental law). Environmental contracts, as described by Orts and Deketelaere and as used herein, refer to binding agreements between public (government) bodies and private (corporate) enterprises.

conditioned upon environmental groups being included in the negotiation, monitoring, and enforcement of such agreements. In order to encourage participation, various incentives can be used, drawing on the development funding abilities of the Kyoto Protocol and other international regimes. In addition, the commitments that currently bind national governments must be maintained; voluntary agreements with industry can only be effective as part of a comprehensive regulatory framework.

2. GLOBAL CLIMATE CHANGE: SCIENCE AND HISTORY

2.1. Climate Change: Science and Impacts

The greenhouse effect has been known since the turn of the 19th century, when a Swedish chemist named Svante Arrhenius first described it.¹¹ The issue of global climate change came to the fore in the mid-1980s¹² and has become a contentious political issue, particularly since the United States rejected the Kyoto Protocol in 2001. During the last twenty years, however, the science has become increasingly certain.

Greenhouse gases ("GHGs") include carbon dioxide ("CO₂"), methane ("CH₄"), nitrous oxide ("N₂O"), tropospheric ozone ("O₃"), and halocarbons ("HFCs," "PFCs," and "SF₆"), among others. When released into the atmosphere, these gases trap heat and contribute to rising air temperatures.¹³ Greenhouse gases are produced by a variety of human activities, most importantly the burning of fossil fuels.¹⁴ All GHGs are not equal—each is assigned a Global Warming Potential ("GWP") number that reflects its relative effect on climate over a one hundred year period.¹⁵ An additional factor (which became important in climate negotiations leading to the Kyoto Protocol) is that GHGs are removed from the

¹¹ SEBASTIAN OBERTHUR & HERMANN E. OTT, THE KYOTO PROTOCOL: INTERNATIONAL CLIMATE POLICY FOR THE 21ST CENTURY 3 (1999) [hereinafter OBERTHUR AND OTT].

¹² Intergovernmental Panel on Climate Change, About IPCC, at www.ippc.ch/about/about.htm (last visited Sept. 24, 2003).

¹³ INTERGOVERNMENTAL PANEL ON CLIMATE CHANGE, CLIMATE CHANGE 2001, SYNTHESIS REPORT: SUMMARY FOR POLICYMAKERS (2001) [hereinafter IPCC SYNTHESIS REPORT], available at http://www.ipcc.ch/pub/SYRspm.pdf (last visited Sept. 24, 2003).

¹⁴ Id. at 4.

¹⁵ OBERTHUR & OTT, supra note 11, at 6-7.

atmosphere by carbon sinks or areas of forest or dense vegetation.¹⁶

Warming projections vary, but the Intergovernmental Panel on Climate Change ("IPCC"), perhaps the most reliable source of scientific data, estimates an increase of 1.4 to 5.8 degrees Celsius (2.5 to 10.4 degrees Fahrenheit) over the next century.¹⁷ As ice caps and glaciers melt, sea levels are expected to rise 9 to 88 centimeters, or 4 to 35 inches.¹⁸ The United States bases its impact estimates at the midrange of these numbers, or about 20 inches.¹⁹

The effects of sea level rises of that magnitude may include widespread coastal flooding, the further melting of glaciers and ice caps, changes in rainfall patterns, more variable and extreme weather, and possibly more catastrophic events—shifts in the Gulf Stream or the collapse of the Greenland or Antarctic ice sheets.²⁰ These changes could in turn lead to widespread social disruption, including human migration, crop failures, and spreading tropical diseases, as well as depleted fresh water supplies.²¹

Many effects are already being felt. Scientists have noted earlier flowering of plants and bird egg-laying, thawing of Alaskan tundra, and shrinking of mountain glaciers atop Mt. Kilimanjaro, in the Andes, and in the Rocky Mountains.²² Severe weather such as recent droughts in North America may be a harbinger of things to come. Recently, climate change has also become a significant topic of discussion in business circles as a potentially disastrous economic threat.²³ Effects on corporate governance and liability, as

¹⁶ Id. at 9.

¹⁷ IPCC SYNTHESIS REPORT, supra note 13, at 8.

¹⁸ Id. at 9.

¹⁹ UNITED STATES ENVIRONMENTAL PROTECTION AGENCY, UNITED STATES CLIMATE ACTION REPORT – 2002: THIRD NATIONAL COMMUNICATION OF THE UNITED STATES OF AMERICA UNDER THE UNITED NATIONS FRAMEWORK CONVENTION ON CLIMATE CHANGE 82 (2002) [hereinafter U.S. C.A.R. 2002], available at http://yosemite.epa.gov/oar/globalwarming.nsf/content/ResourceCenterPublic ationsUSClimateActionReport.html.

²⁰ OBERTHUR & OTT, supra note 11, at 4-6.

²¹ IPCC SYNTHESIS REPORT, supra note 13, at 9-12.

²² See UNFCCC PRELIMINARY REPORT, A GUIDE TO THE CLIMATE CHANGE CONVENTION AND ITS KYOTO PROTOCOL [hereinafter UNFCCC PRELIMINARY GUIDE] (describing present effects that have occurred due to the change in climate), available at http://unfccc.int/resource/guideconvkp_p.pdf.

²³ See CERES SUSTAINABLE GOVERNANCE PROJECT REPORT, VALUE AT RISK: CLIMATE CHANGE AND THE FUTURE OF GOVERNANCE (April 2002) [hereinafter VALUE AT RISK] (explaining that more pressure is being put on company executives as the effects of climate change begin to be revealed), available at http://www.ceres.org/reports/main.htm.

well as on the insurance industry, are expected to be widespread.²⁴

An emerging topic of discussion is the possibility that the United States will be left behind in the race for green technology. As the primary mover behind the Kyoto Protocol,²⁵ the European Union has also taken the lead in climate change innovation.²⁶ The European Union is "mobiliz[ing] its industrial sector, research institutes and the public for the task of making the transition into renewable resources and a hydrogen future."²⁷ For example, the European Union has set an internal target of 22% renewable energy sources for electricity by 2010,²⁸ a target that will undoubtedly spur technological innovation. Indeed, the technological work for General Motors' new hybrid concept car came almost exclusively from Europe.²⁹

2.2. International Response: The U.N. Framework Convention on Climate Change and Kyoto Protocol

As international concern mounted, the United Nations Environment Programme ("UNEP") and World Meteorological Organization ("WMO") established the Intergovernmental Panel on Climate Change in 1988.³⁰ Its first report in 1990 confirmed the threat and called for an international treaty to address the problem.³¹ That treaty took shape during the 1992 Earth Summit in Rio de Janeiro, Brazil, and entered into force in 1994 as the United Nations Framework Convention on Climate Change ("UNFCCC").³² Overall, 186 nations are now parties to the Convention; these parties meet annually at the Conference of the Parties ("COP").³³

The UNFCCC was more a declaration of principles than a

²⁴ Id. at 11.

²⁵ OBERTHUR & OTT, supra note 11, at 14.

²⁶ Jeremy Rifkin, End of the Fossil-Fuel Era: Will the European Union Take the Lead in Staking Out the Future of Energy?, WASH. POST, Sept. 26, 2002, at A32, available at http://www.washingtonpost.com.

²⁷ Id.

²⁸ Id.

²⁹ Id.

³⁰ UNFCCC Climate Change Information Kit, Information Sheet 17 (July 2002) [hereinafter UNFCCC Info Kit], available at http://unfccc.int/resource/iuckit/index.html.

³¹ Id.

³² UNFCCC PRELIMINARY GUIDE, supra note 22.

³³ Id

detailed and binding treaty reducing emissions.³⁴ A key aspect of the treaty is its division of nations into "Annex I" (forty-one industrialized countries and economies in transition, such as the former Soviet Union and Eastern European states) and "Annex II" (twenty-four wealthy members of the Organization of Economic Cooperation and Development).³⁵ The remaining countries of the world are described as "non-Annex I" countries.³⁶ This division serves as the basis for the later Kyoto Protocol rules.

The Kyoto Protocol was adopted in Kyoto, Japan, in 1997 at the Third Convention of the Parties, or COP 3.37 The initial agreement consisted of binding commitments by Annex B (or all UNFCCC Annex I parties) nations to reduce GHG emissions by fixed amounts from 1990 levels by 2008-2012.38 These targets varied by country.39 The European Union agreed to reduce GHG emissions by 8% within the agreed-upon period.40 The United States would reduce its emissions by 7%.41 Economies in transition had the option of using a different baseline year than 1990, taking into account that the transition to market economies for many of these countries began around that year.42 In addition, certain GHGs could be subject to a 1995 baseline due to parties' implementation of the Montreal Protocol (reducing ozone-depleting chemicals, which in some cases led to higher GHG production).43

These binding commitments are at the heart of the Kyoto Protocol as it stands today, but the agreement contains other important provisions agreed upon in the years after COP 3. The Protocol recognizes other ways of meeting emissions reduction targets, such as in the land-use, land-use change, and forestry ("LULUCF") sector, accounting for carbon sinks, and afforestation, reforestation or deforestation.⁴⁴ The Protocol includes three mechanisms through which emissions reductions can be

³⁴ OBERTHUR & OTT, supra note 11, at 33.

³⁵ UNFCCC Info Kit, *supra* note 30, at Information Sheet 18.

³⁶ UNFCCC PRELIMINARY GUIDE, supra note 22.

³⁷ Id.

³⁸ Id.

³⁹ Id.

⁴⁰ Id.

⁴¹ Id.

⁴² ld.

⁴³ Id.

⁴⁴ Id.

encouraged. The first is joint implementation ("JI"), through which industrialized, Annex I nations can essentially invest in emissions reduction methods in other Annex I countries and receive credit toward their own emissions targets.⁴⁵ The second is clean development mechanisms ("CDMs"), which allow Annex I nations to invest in projects in non-Annex I, developing countries, and receive credit toward their own targets.⁴⁶ The third is emissions trading, which allows Annex I parties to trade emissions credits with other Annex I parties who may have an easier or harder time meeting their targets.⁴⁷ The COP 3 agreement did not, however, address the rulebook for implementing the cuts in GHG emissions. This was accomplished through negotiations afterward at COP 6 in Bonn and at COP 7 in Marrakesh.⁴⁸

The Kyoto Protocol will enter into force upon ratification by fifty-five countries.⁴⁹ Included in that number must be Annex I parties accounting for at least 55% of Annex I's 1990 emissions.⁵⁰ With Russia's announcement that it would ratify the accord, Kyoto is expected to go into force in 2003.⁵¹

2.3. Alternative Views

There remains a view, held by a shrinking number of scientists, but powerfully attractive to American conservatives, that the

⁴⁵ Id.

⁴⁶ Id.

⁴⁷ Id.

⁴⁸ Id.

⁴⁹ Id.

⁵⁰ See Press Release, UNFCCC, Kyoto Protocol Receives 100th Ratification (Dec. 18, 2002) [hereinafter UNFCCC Press Release] (indicating that Russia's ratification of the Kyoto Protocol would push the percentage of ratifying developing countries above the mandatory 55%), available at http://unfcc.int/press/prel2002/pressure1181202.pdf. Importantly, while this Comment was in the editorial process, Russia announced that it would delay ratification, and statements by Russian officials indicated that Russia might reject the treaty entirely. See Tim Hirsch, Climate Talks End Without Result, BBC NEWS WORLD EDITION (Oct. 3, 2003) (describing the reaction to the evolving Russian position), at http://news.bbc.co.uk/2/hi/science/nature/3163030.stm (last visited Oct. 9, 2003). While such an action would obviously change much of this Comment's analysis, it does not change the basic assertion that the international climate regime needs to be uncoupled from national action—indeed, Russia's move further emphasizes the point that without new tools, the climate regime is hostage to domestic politics.

⁵¹ See UNFCCC Press Release, supra note 50 (describing the effects of Russia's ratification of the Kyoto Protocol).

science behind climate change projections is itself faulty.⁵² However, "Exxon, Mobil Oil and other fossil fuel industries" have funded many of these "climate skeptics."⁵³ Despite their underlying credibility problems, climate skeptics have managed to maintain a high profile due to Republican Congressional support in the United States.⁵⁴

In addition, there are many in the Bush Administration who feel that the best response to climate change is to find ways to adapt, rather than fight. This stance is highlighted in the U.S. 2002 Climate Action Report, which states that "[a]lthough changes in the environment will surely occur, our nation's economy should continue to provide the means for successful adaptation to climate changes."⁵⁵ This view, however, ignores the potentially devastating effects of climate change (for example, massive losses by insurers) on the economy intended to support adaptation, a situation that is not addressed in the report.

Finally, some Northern countries believe that they stand to gain from climate change, as warmer weather makes frozen parts of the Arctic more accessible.⁵⁶ Despite such thoughts, Russia and other Northern countries such as Canada have announced that they will ratify the Kyoto Protocol.⁵⁷

Skeptics notwithstanding, the Kyoto Protocol is a remarkable document, creating out of whole cloth a system to regulate emissions in many countries with vastly different interests. While the Protocol's binding emissions targets are necessary to achieve substantial reductions, they are more important as a unifying theme. The parties say, in effect, "these are the absolute limits, and how you meet them is up to you." But this system is highly flawed. The targets are controversial; variations in the current

⁵² See OBERTHUR & OTT, supra note 11, at 10 (noting that a small group of "climate skeptics" find fault with the IPCC's methods.)

⁵³ Id.

⁵⁴ Id.

⁵⁵ U.S. C.A.R. 2002, *supra* note 19, at 6.

⁵⁶ See OBERTHUR & OTT, supra note 11, at 23 (noting the belief of the Russian elite that, over time, a warmer climate could lead to arable land where it never existed before).

⁵⁷ See UNFCCC Press Release, supra note 50 (a:nouncing Canada's ratification of the Protocol and the expectation that Russia will soon follow suit). Again, recent developments have called Russia's commitment into question. See supra note 50 and accompanying text (describing Russia recent backing away from the Protocol).

economic and environmental situations of countries make meeting the targets more or less difficult in different cases. Most importantly, the process is held hostage to countries' internal politics. Particularly in the United States—where powerful interest groups (including an especially strong pro-business lobby) are arrayed on all sides, and an administration and Congress are openly hostile to both international agreements and environmental regulation—the Kyoto Protocol has been a dead letter for some time.

THE KYOTO PROTOCOL: POLITICS AND PLAYERS

3.1. Corporate Opposition

Corporate opposition helped sink American acceptance of the Kyoto Treaty. One scholar described the process as follows:

The Global Climate Coalition (GCC) was created by major MNCs to battle any reduction commitments. Its members initially included the American Petroleum Institute, Ford, [General Motors], Chrysler, Dow Chemical, DuPont, Exxon, American Automobile Manufacturers Mobil. the Association, Chevron, Shell, Texaco, and Union Carbide. According to CorpWatch, a non-profit organization promoting corporate environmental accountability, the GCC used various strategies to defeat U.S. ratification of the Protocol. These strategies included: (1) raising public concerns about unemployment resulting from emissions regulations, (2) releasing reports with "dubious scientific legitimacy" that questioned whether global warming was taking place, (3) attending climate negotiation meetings "en masse," (4) sending a letter "signed by 119 of the U.S.'s most prominent business leaders" to President Clinton, asking that all current climate proposals be rejected, and (5) insisting that developing countries commit to the same stringent reductions as industrialized nations.58

⁵⁸ Donald O. Mayer, Corporate Governance in the Cause of Peace: An Environmental Perspective, 35 VAND. J. TRANSNAT'L L. 585, 612 (2002) (citations

This corporate lobbying power is considerable. Rather than take on such interests directly, those concerned about climate change must attempt to peel away their constituent parts, marginalizing truly obstructionist companies like ExxonMobil. The world's largest corporation and most prolific oil company, ExxonMobil is fiercely opposed to the Kyoto Protocol, and its efforts against the treaty included an expensive advertising campaign in the United States.⁵⁹ Unfortunately for ExxonMobil, its actions have turned the spotlight more harshly on its climate change stance, and the company now faces a determined shareholder battle that hopes to alter management's policy from within.60 More importantly, however, ExxonMobil is one star in a shrinking universe of companies, and is squared off against a growing assortment of its competitors, including British Petroleum/Amoco ("BP"), Royal Dutch/Shell ("Shell"), and Sunoco, all of which have accepted the need for change.61

omitted). The power exerted in Washington by such interests is enormous, and has resulted in a well-reported push to open new wilderness areas to oil and gas exploration. The Administration's defeat in the Senate on its attempt to open the Alaska National Wildlife Refuge is not part of a larger trend, although it is evidence that there might be an outer limit on how far such new efforts can go. See David Firestone, Drilling in Alaska, A Priority for Bush, Fails in the Senate, N.Y. TIMES, Mar. 20, 2003, at A29 (discussing the Bush administration's failure to get its Alaskan drilling agenda through the Senate), available at http://www.nytimes.com/2003/03/20/politics/20DRIL.html.

⁵⁹ See Mark Mansley, Risking Shareholder Value? ExxonMobil and Climate Change, An Investigation of Unnecessary Risks and Missed Opportunities, Claros Consulting Discussion Paper, at 12 (May 2002) (describing ExxonMobil's advertising campaign in the New York Times), available at http://www.campaignexxonmobil.org/pdf/riskingvalue.pdf.

⁶⁰ See id. at 33 (listing action points for investors and shareholders); see also Campaign ExxonMobil (posting the letter to a shareholder group explaining that ExxonMobil is "working to convince the company that its practices are creating a global threat to the environment and the economy as well as putting shareholders at unnecessary risk"), at http://www.campaignexxonmobil.org/learn; Commentary on Exxon and Global Warming, Robert A.G. Monks website (listing various articles and reports compiled by shareholder and corporate governance activist Robert A.G. Monks, who asks, "how long do the owners of EXXON have to wait for their company to moderate its confrontational attitude about global warming?"), at http://www.ragm.com/library/topics/exxon.html (last visited Aug. 26, 2003).

⁶¹ With an increasing recognition of the soundness of scientific knowledge regarding global warming, a growing number of companies have begun to sign on to initiatives to combat it. British Petroleum is one of the leading corporate proponents of the Kyoto Protocol, and many corporations have signed onto initiatives in the United States. See Pew Center website, supra note 4; CERES

3.2. Political Opposition

The major theme of political opposition to Kyoto in the United States has been that the Protocol's binding targets threaten the U.S. economy.⁶² In addition, traditional conservative opposition to regulation—especially of the command-and-control type—has fed a widespread distrust of the Kyoto Protocol.⁶³ This growth-vs.-environment, regulation-vs.-business battle has long divided the two main political camps in the United States—in general, Democrats have supported stronger environmental regulations while Republicans have opposed them.⁶⁴ The outcome of such

website, *supra* note 8 (listing a number of companies endorsing initiatives for business change in the interest of environmental protection); *see also* BP, *Explaining Climate Change* (stating that "BP supports [the Kyoto] process and seeks to contribute actively to the objectives laid out in the UNFCCC"), *at* http://www.bp.com/environ_social/environment/clim_change/ issue.asp (last visited Aug. 26, 2003); Mark Moody-Stuart, former Chairman of Royal Dutch/Shell Group, Speech at the Ministerial Forum on the Kyoto Mechanisms, Ottawa, Canada (Oct. 8, 1999) (stating that "Shell has made a clear commitment to Kyoto and [w]e will deliver on it"), *available at* http://www.shell.com/home/Framework?siteId=media-en&FC1=&FC2=&FC4=&FC5=&FC3=/media-en/html/iwgen/news_and_library/speeches/1999/theimportanceofthe_10171250.html (last visited Aug. 26, 2003); Sunoco, *The CERES Principles* (describing Sunoco's adoption of the CERES Principles), *at* http://www.sunocoinc.com/health_env_safety/ceresprinf.htm (last visited Aug. 26, 2003).

- ⁶² See Republican National Committee, American Partners in Conservation and Preservation: Stewardship of Our Natural Resources (2000) (arguing that the Kyoto Conference approach to global warming is "unrealistic" and would be "ineffective and unfair" to developed nations) [hereinafter RNC Platform 2000], available at http://www.rnc.org/GOPInfo/Platform/2000platform6.htm.
- ⁶³ See generally id. (evidencing distrust of the Kyoto Conference's approach to dealing with global warming).
- Prosperity, Progress and Peace (2000) ("[W]e must dramatically reduce climate-disrupting and health-threatening pollution in this country, while making sure that all nations of the world participate in this effort."), available at http://www.democrats.org/about/2000platform.html; RNC Platform 2000, supra note 62 ("More research is needed to understand both the cause and the impact of global warming A Republican president will work with businesses and with other nations to reduce harmful emissions through new technologies without compromising America's sovereignty or competitiveness and without forcing Americans to walk to work "). This is, of course, a very broad generalization. Northeastern Republican moderates in the Senate and House, including now-Independent Senator Jeffords of Vermont, Senators Snowe and Collins of Maine, Senator Chafee of Rhode Island, and Representative Boehlert of New York are supportive of environmental causes generally, while Southeastern and Mountain West Democrats tend to be more likely to support new drilling initiatives.

political tension should, by now, have been made abundantly clear to the international community: agreements forged with representatives of one party can quickly fall apart when the other takes power. In part, this is a phenomenon exacerbated by a growing chasm between the largest American political parties despite a near-equal distribution of electoral power between Republicans and Democrats.

It is important to note, however, that the United States was never close to ratifying the Kyoto Protocol, even under the Clinton Administration. Indeed, that Administration never sent the signed Protocol to the Senate for a vote, knowing that the agreement would be handily rejected.⁶⁵ This reflects more than simply American dislike for regulation. Despite the recent hue and cry over an observed unilateralist tilt in the Bush Administration, there has always been a strong distrust of international agreements in American politics.⁶⁶ This current is unlikely to change even after the present Republican ascendancy.

Therefore, it is important to understand that unilateralism under Bush is not new, though it comes in a less subtle package. It may never be possible for the United States to be enticed into ratifying the Kyoto Protocol without so weakening the agreement that it will be practically useless. The world community's response must go beyond condemnation to considering practical steps that could lower U.S. emissions even without official U.S. participation, while perhaps making participation more palatable to American

Compare Press Release, Office of Representative Sherwood Boehlert (R-N.Y.), Boehlert Reacts to President Bush's Clean Air Speech (Feb. 14, 2002) (quoting Rep. Boehlert: "I continue to support mandatory actions to address global climate change"), available at http://www.house.gov/boehlert/cleanair1.htm (last visited Sept. 26, 2003), with Press Release, Office of Senator Mary Landrieu (D-La.), Landrieu Works to Defeat Unrealistic Auto Standards, (Mar. 12, 2002) ("Senator Mary L. Landrieu (D-La.) joined many of her colleagues today in fighting the proposed increase in the Miles-per-Gallon standards [long sought by environmental groups working on climate change issues]."), available at http://www.senate.gov/~landrieu/releases

^{/02/2002313}C08.html (last visited Sept. 26, 2003).

⁶⁵ See Natural Resources Defense Council, Bush Administration Errs on Kyoto Global Warming Agreement (Sept. 26, 2003) (stating that the protocol has never been submitted to the Senate for ratification although the Bush administration has referred to a vote on the non-binding Byrd-Hagel resolution, which registered views on some aspects of protocol negotiations), at http://www.nrdc.org/globalWarming/akyotoqa.asp (last visited Sept. 26, 2003).

⁶⁶ See generally ORTS & DEKETELAERE, supra note 10 (introducing a comparative discussion of environmental regulation in the United States and Europe).

business interests. To do that, climate negotiators must not wait for an American "regime change," but should do an end run around American politics entirely, directly involving the special interests—the business and environmental groups that move American politicians.⁶⁷

3.3. Growing Support

Despite the political and corporate opposition to the Kyoto Protocol, the trend is toward stricter emissions regulation, not weaker, even in the United States. State governments, most importantly California, have enacted far more stringent standards than the federal government.⁶⁸ As mentioned elsewhere, legislation has been introduced in both houses of the U.S. Congress tightening emissions controls, though the standards remain below those in the Kyoto Protocol.⁶⁹ These controls currently target non-GHG emissions such as carbon monoxide, but GHGs may soon be included. Some corporations appear to be getting the message that climate change and environmental issues in general are increasingly seen not merely as the dalliances of educated urbanites, but as critical national security and policy issues.⁷⁰

⁶⁷ It should be noted that Americans are not alone in their distrust of international environmental regulation. Canada and Australia, for example, had debates quite similar to those in the United States involving parallel interest groups and political parties. See, e.g., Tom Cohen, Canada Ratifies Kyoto Protocol Following Months of Debate, Associated Press, (Dec. 17, 2002) (describing "rancorous debate" in Canada over ratification), available at http://www.enn.com/news/wire-stories/2002/12/12172002/ap_49191.asp (last visited Sept. 26, 2003); Stephanie Peatling, Kyoto Good for the Nation, Sydney Morning Herald, Feb. 17, 2003, at 8 (noting the conservative Australian "Federal Government's refusal to ratify the international agreement").

⁶⁸ See Gary Polakovic, California Sues Over E.P.A. Changes to Clean-Air Laws, L.A. TIMES, Feb. 28, 2003, at 8 ("California emissions controls typically are more stringent than those by the federal government."); see also Georgina Gustin, 'Clean Cars' Seen as Key to State Air Quality, DAY, June 11, 2003 ("New York and Massachusetts have already adopted the California regulations."), at http://www.evworld.com/databases/shownews.cfm?pageid=news120603-01 (last visited Sept. 26, 2003).

⁶⁹ See, e.g., Revkin, supra note 2 (stating that a lack of voluntary emissions control by industries has created stricter legislative proposals to regulate emissions in Congress); see also New Players on Global Warming, supra note 3 (discussing bipartisan emissions reduction legislation introduced in the United States Senate by Senators John McCain of Arizona and Joseph Lieberman of Connecticut).

⁷⁰ See Frey, supra note 4 (discussing BP's actions in support of the Kyoto Protocol); Danny Hakim, Hybrid Autos Quick to Pass Curiosity Stage, N.Y. TIMES, Jan. 28, 2003, at A1 (describing automakers' efforts to produce hybrid cars as an

Campaigns such as those discussed below are also raising corporate awareness of climate change as a business concern. These moves by private industry, while falling well short of what is needed, can be the first steps toward creating a new direction for global climate policy.

3.4. Non-State Actors in the Climate Play

3.4.1. Multinational Enterprises

Multinational enterprises are among the primary agents of greenhouse gas emission in the world, and can therefore be among the primary agents of positive change. British Petroleum, which discloses its emissions on its website, emitted nearly twenty million fewer metric tons of GHGs in 2002 than it did in 1998.71 That decrease is larger than the entire 1995 emissions output of smaller nations like Luxembourg, Iceland, Slovenia, Estonia, Monaco, or Latvia (all Annex I developed countries) or equivalent to about half the output of industrial powers Norway or Sweden in that same year.⁷² BP's 95.3 million metric ton GHG output in 1998 was greater than the 1995 emissions output of Luxembourg, New Zealand, Denmark, Ireland, Lithuania, Finland, Iceland, Slovakia, Slovenia, Norway, Austria, Portugal, Hungary, Switzerland, Estonia, Monaco, Sweden, or Latvia.73 Put another way, if BP's 1998 level of GHG emission had been ranked among Annex I nations in 1995 (1998 figures are not conveniently available for all nations), it would have found itself in 17th place among the 35 Annex I countries.⁷⁴ One can only speculate where the planet's

alternative to popular sport utility vehicles whose lack of fuel efficiency negatively affects national policies).

⁷¹ See British Petroleum, Our Performance (describing BP's emissions, performance, and other progresses with regard to climate change challenges), at http://www.bp.com/ environ_social/environment/clim_change/perform.asp#c (last visited Sept. 26, 2003).

⁷² See Center for International Climate and Environmental Research-Oslo (CICERO), Emissions in Annex I Countries 1995 [hereinafter Emissions Annex] (charting emissions in Annex I countries), at http://www.cicero.uio.no/background/Emissions.html (last visited Sept. 26, 2003).

⁷³ See id

⁷⁴ The numbers for BP and Annex I countries are from, respectively, BP's Climate Change Data Charting Tool, *at* http://www.bp.com/environ_social/approach/charting_tool.asp; Emissions Annex, *supra* note 72. Emissions vary widely among countries due to factors such as type of industry, population, level of industrialization, and possession of heavily forested areas, which makes such

largest energy company, U.S.-based ExxonMobil, might have fallen on that list. Such comparisons make it clear that MNEs, many of them in the high-emissions areas of energy, transportation, and resource extraction, account for a significant amount of the world's GHG output. To leave U.S.-based MNEs outside the Kyoto process is to fight climate change with one fist tied behind the international back.

Multinational enterprises operate without borders and are therefore more susceptible to the type of incentives that can be applied by the UNFCCC.⁷⁵ Douglas Branson quotes Lawrence Mitchell to describe the impact of MNEs:

[N]o institution other than the state so dominates our public discourse and our private lives . . . [C]orporations make most everything we consume. Their advertising and products fill almost every waking moment of our lives. They give us jobs, and sometimes a sense of identity. They define communities, and enhance both our popular and serious culture. They present the investment opportunities that send our children to college, and provide for our old age. They fund our research.⁷⁶

Branson identifies the green movement as one of the three key driving forces behind the new corporate social responsibility movement.⁷⁷ He describes four reasons why this new movement is more likely to have concrete benefits than an earlier such movement in the 1970s.⁷⁸ First, the movement is "more muted, less shrill, and therefore more sustainable."⁷⁹ Second, the movement is largely based on notions of "enlightened self-interest" rather than

comparisons useful for illustration only. Still, while oil companies cannot avail themselves of carbon sinks to offset emissions, they could perhaps invest in reforestation to offset emissions.

⁷⁵ See Geoffrey C. Hazard, Jr. & Eric W. Orts, Environmental Contracts in the United States, in ORTS & DEKETELAERE, supra note 10, at 88-89 [hereinafter HAZARD & ORTS] (describing the possibility of using contractual terms in international development concessions to limit emissions).

⁷⁶ Douglas M. Branson, Corporate Social Responsibility Redux, 76 Tul. L. Rev. 1207, 1218 (2002).

⁷⁷ Id. at 1222.

⁷⁸ Id. at 1225.

⁷⁹ Id.

calls for more government intervention.⁸⁰ Third, corporate social responsibility is converging with broader trends in "good governance" strategies already in motion among corporations.⁸¹ Finally, and most importantly for the Kyoto Protocol, is an increasing level of support for international measures to halt environmental degradation.⁸² This support is evidenced not only by corporate efforts to live according to the CERES Principles or ISO 14000 standards, which may not amount to the levels of emissions reductions targeted by Kyoto, but growing support for Kyoto itself.⁸³

3.4.2. Non-Governmental Organizations

Non-governmental organizations have long played a critical role in enforcing U.S. environmental laws through their ability to sue businesses and government agencies in American courts. Partly as a result of private enforcement provisions in American laws, the United States has (despite its opposition to the Kyoto Protocol) the world's strictest legal environmental protection. For example, two such NGOs, Greenpeace and Friends of the Earth, are plaintiffs in a lawsuit against the U.S. government involving climate change policy.⁸⁴

It is clear that NGOs also play a crucial role on the world stage, and have been included in climate negotiations at every stage. Still, NGOs are restricted to an advisory role in international agreements, as are businesses. The decision-makers remain in foreign and environmental ministries. As with businesses, NGOs are organizations that operate without borders, include members from many countries, and are not subject to domestic political

⁸⁰ Id.

⁸¹ Id.

⁸² Id.

⁸³ *Id. at* 1226. Branson identifies Dupont, Enron, Weyerhaeuser, and Boeing as among thirty-six U.S. corporations that joined with the Pew Center on Climate Change to try to bring the United States back into a leadership role on global climate change. For a full listing of these companies and an explanation of the Pew Center's initiative, see Pew Center website, *supra* note 4.

of Members Impacted by Global Warming, available at http://www.greenpeaceusa.org/features/climatelawsuit-text.htm; see also Katharine Q. Seelye, 2 Western Cities Join Suit to Fight Global Warming: U.S. Policy on Fossil-Fuel Projects Attacked, N.Y. TIMES, Dec. 24, 2002, at A20 (reporting that Boulder, Colorado and Oakland, California have joined the Greenpeace and Friends of the Earth lawsuit).

shifts. NGOs and businesses may find, upon reflection, that they share concerns as private organizations that are not foremost in the minds of government actors. Unlike businesses, however, NGOs most often form around moral issues. This value-driven component and their international expertise make NGOs as important as businesses to any refocused climate change regime, since new climate initiatives will necessarily involve balancing moral and economic concerns.

4. Private Environmental Initiatives

Outside the glare of media attention on ecosummits like Rio, Kyoto, and Johannesburg, non-state actors have been busily coming up with innovative ways to encourage voluntary emissions reductions. These schemes include industry self-regulation, environmental contracts, environmental auditing and disclosure, green labeling, and environmental management systems. All of these trends are encouraging; all have drawbacks as stand-alone solutions. What is clear is that these private initiatives are left by the Kyoto Protocol to be implemented either by the parties or by non-state actors. Were the Protocol to include another, "private" leg, nonparticipation by governmental laggards like the United States would be a less threatening problem, and U.S. participation might become more likely.

4.1. Environmental Contracts

Environmental contracts involve government and private corporations or individuals. In the United States, the Clinton Administration's Project XL, an Environmental Protection Agency ("EPA") initiative that had mixed success, used environmental contracts.⁸⁵ Environmental contracting is much better developed in

some successful results but did not generate active participation). Part of the difficulty in the United States involves the highly particularized nature of American environmental statutes, which creates constitutional roadblocks to agency flexibility. Constitutional problems have made it difficult to bind agencies in contracts. These problems may have been partially overcome by the Supreme Court's decision in United States v. Winstar, 518 U.S. 839 (1996) (holding the government liable for breach of contract damages to savings and loan institutions even though it breached its contracts with them only because Congress later enacted contradictory requirements). See id. at 84-85 (describing United States v. Winstar as indicative of a prohibition on the government's ability to renege on a

Europe, particularly in the Netherlands and Belgium.⁸⁶ These agreements can be between governments or agencies, and industry sectors or individual companies, although even in Europe there are constitutional limitations on the binding force of agreements that violate statutory law.⁸⁷

The most important type of contract for climate purposes is one that runs across national borders. An example is the European agreement with European automobile Commission's As part of its strategy for meeting European manufacturers. targets in the Kyoto Protocol, the European Commission decided to pursue a voluntary emissions-reduction and fuel economy agreement with the auto industry.88 A final agreement was reached in June 1998 and endorsed in a July 1998 Commission Recommendation.89 According to the agreement, the European Automobile Manufacturers Association ("ACEA") agreed to reduce the average carbon dioxide emissions of its vehicles to 140g/km by 2008.90 Moreover, the European Union was then able to reach similar voluntary agreements with Korean and Japanese automakers.91

However, the idea of such agreements has not necessarily become widespread in E.U. policy due to hostility in the European

regulatory contract, in some instances); Michael Faure, Environmental Contracts: A Flemish Law and Economics Perspective, in ORTS & DEKETELAERE, supra note 10, at 171 (asserting that the Winstar doctrine has, to some extent, remedied the problem of the government withdrawing from regulatory agreements).

⁸⁶ See Eric W. Orts & Kurt Deketelaere, Introduction: Environmental Contracts and Regulatory Innovation, in ORTS & DEKETELAERE, supra note 10, at 5-6 (listing European countries where environmental agreements have been used for decades).

⁸⁷ See Rene Seerden, Legal Aspects of Environmental Agreements in the Netherlands, in Particular the Agreement on Packaging and Packaging Waste, in ORTS & DEKETELAERE, supra note 10, at 192-93 (explaining the types of environmental agreements found in the Netherlands, which are considered to be private law contracts when intended to be legally binding, and void if they violate statutory requirements).

⁸⁸ Geert van Calster & Kurt Deketelaere, *The Use of Voluntary Agreements in the European Community's Environmental Policy* [hereinafter VAN CALSTER & DEKETELAERE], *in* ORTS & DEKETELAERE, *supra* note 10, at 228 (citing Commission Communication Implementing the Community Strategy to Reduce CO₂ Emissions from Cars: An Environmental Agreement with the European Automobile Industry, COM(98) 495).

⁸⁹ Id. at 230-31.

⁹⁰ Id. at 230.

⁹¹ Id.

Community and some legal barriers relating to competition and state aid.⁹² These problems can be overcome, especially if care is taken that contracts are legally enforceable and that all interested parties play a role in both the negotiation and enforcement of the contracts. It is not clear how involved environmental groups were in the negotiation process between the European Union and ACEA.⁹³ In order to make such agreements palatable to all parties, those interested, including environmental NGOs, must be given the opportunity to participate.

The benefits of environmental contracts, on the other hand, make them uniquely suitable for use in the climate change context. Environmental contracts can be multijurisdictional extraterritorial, which could eliminate the problem of national politics.94 Most importantly, the contracts should be attractive to industry officials because they draw on ingrained business practices. As a result, the use of environmental contracts to augment legislation and regulation, (and in some cases, replace them) can achieve both breadth and depth in climate policy: breadth, in that they can bring MNEs and NGOs to the negotiating table, and depth, in that they reach down into organizations using their own operating methods.

4.2. Environmental Auditing and Disclosure

The European Union has implemented a system called the Eco-Management and Reporting Scheme ("EMAS").95 This system is similar in some ways to the ISO 14000 standards described below, but also adds some critical components. EMAS carries legal force within the European Union, and thus can prescribe actions that the purely voluntary ISO 14000 cannot.96 In addition, companies must adhere to strict disclosure standards.97 As of July 2003, nearly 4,000 European companies were certified under EMAS, with Germany

⁹² Id. at 237.

⁹³ Id.

⁹⁴ See HAZARD & ORTS, supra note 75, at 86-87 (describing the advantages to using a contractual approach to address environmental problems).

⁹⁵ See EMAS Website (providing information on EMAS to the public), at http://europa.eu.int/comm/environment/emas/index_en.htm (last visited Oct. 30, 2003).

[%] EMAS Executive Summary, EMAS website, *supra* note 95, *at* http://europa.eu.int/comm/environment/emas/about/summary_en.htm (last visited Oct. 30, 2003).

⁹⁷ Id.

leading the way at over 2,400.98 EMAS benefits from a combination of voluntariness and legal commitment, as companies are not required to join unless they wish to, but are bound by their agreements and subject to EMAS's prescriptive powers once they join. The drawback, of course, is that it is not easy to convince a sufficient number of corporations to join the program, as is evidenced by the stark difference between numbers of companies joining the less stringent ISO 14001 standards and those signing up for EMAS.99

In addition to EMAS, private voluntary movements are afoot in the United States and elsewhere. One such program is the Global Reporting Initiative ("GRI"). The GRI program "seeks to make sustainability reporting as routine and credible as financial reporting in terms of comparability, rigor, and verifiability." GRI is purely voluntary, and participating companies may disclose "in accordance" with GRI requirements or "not in accordance," as they wish. This is a loophole that may need to be closed to include reporting in an effective climate regime, but it does encourage wide participation. 103

Disclosure programs are effective for several reasons. First, they promote a dialogue between corporations and the public about corporate environmental practices.¹⁰⁴ Second, they are

⁹⁸ Chart, The Number of ISO 14001/EMAS Certification/Registration of the World, July 2003 [hereinafter ISO/EMAS Chart], available at http://www.ecology.or.jp/isoworld/english/analy14k.htm.

⁹⁹ Id.

¹⁰⁰ See Global Reporting Initiative Website (providing information on the Global Reporting Initiative for the public), at http://www.globalreporting.org (last visited Oct. 30, 2003).

¹⁰¹ United Nations Environment Programme Website [hereinafter UNEP Website], at http://www.globalreporting.org/governance/archives/HostLetter Annex.pdf (last visited Sept. 25, 2003).

¹⁰² See Organizations Using the Guidelines, UNEP Website (describing the voluntary nature of the Sustainability Reporting Guidelines), supra note 101, at http://www.globalreporting.org/guidelines/companies.asp (last visited Sept. 25, 2003).

¹⁰³ Id. Companies participating in, but "not in accordance" with, GRI include such giants as General Motors, Ford, Hewlett-Packard, Deutsch Telekom, and Matsushita Electric. Only a few companies are "in accordance," including the Australian mining company BHP Billiton and the Hungarian automotive company DENSO Manufacturing. Reporters in Accordance, UNEP Website, supra note 101, at http://www.globalreporting.org/guidelines/reporters_IA.asp (last visited Sept. 25, 2003).

¹⁰⁴ NEIL GUNNINGHAM ET AL., SMART REGULATION 62 (1998).

useful for companies trying to reform their internal practices; indeed, "[t]he very act of compiling a report necessarily entails a degree of introspection that may reveal previously hidden opportunities for abating pollution." However, disclosure programs are only effective if they either contain sufficient incentives for corporations to join (in which case they may be too watered down to be effective as emissions reducing devices), or are sufficiently coercive and backed by law. Groups like CERES and the ISO have gone a long way toward making environmental reporting acceptable to businesses, but EMAS's binding commitments may be a better model for climate change negotiators.

One American scholar has suggested that environmental audits be required of all publicly traded companies. ¹⁰⁶ In the context of Kyoto, any company wishing to participate in any of the Protocol's mechanisms could be required to conduct audits, and be certified according to EMAS-like principles. More importantly, however, companies must still be held accountable, meaning that audits should be publicly disclosed. There are multiple reasons why disclosure is critical. Disclosure promotes efficient securities markets. ¹⁰⁷ It can help inform investors and consumers who may make judgments based on environmental performance. ¹⁰⁸ In addition, disclosure empowers NGOs and citizens who can be effective co-enforcers.

Beyond the marketplace, disclosure furthers citizen power and advances democratic decision-making. It allows local residents and members of the public to participate more effectively in permitting, land use, and other local political decisions involving the company. It enhances the public's ability to bargain with private corporations and exert pressure on companies to change their environmental practices. It also enables citizens to enforce environmental laws, since "the public cannot participate in [the enforcement] process without having access to adequate information regarding a facility's compliance with environmental regulations." In essence, disclosure has an important deterrent function and helps promote compliance by raising the firms' costs

¹⁰⁵ Id.

¹⁰⁶ Clifford Rechtschaffen, Deterrence vs. Cooperation and the Evolving Theory of Environmental Enforcement, 71 S. CAL. L. REV. 1181, 1248 (1998).

¹⁰⁷ Id. at 1248-49.

¹⁰⁸ Id.

of violating environmental requirements. 109

Environmental auditing and disclosure, like environmental contracts, thus broaden and deepen the climate change regime's ability to bring about real emissions reductions. They reach the public as well as NGOs and MNEs, and they use auditing and disclosure practices that are quite familiar to businesses that are under such requirements for their financial condition.

4.3. Environmental Management Systems

The environmental management system ("EMS") is another alternative to traditional command-and-control environmental regulation. Such systems can be best described as "a formalized set of procedures and policies by which an organization systematically identifies, evaluates, and manages its impacts on the environment."

These programs vary in their disclosure requirements and scope, but share a critical feature; they are voluntary agreements involving actors with truly global concerns and involvement.

ISO 14000 is an EMS that has become widely accepted around the world by businesses. The system is a family of standards developed by the International Organization for Standardization, which is a worldwide group of standardization entities that devises standards for such products as plastic credit cards. IsO 14000 is a generic system (meaning that it applies across product lines), and is process-oriented (meaning that it applies not to a company's end product, but to the way it gets to that end). IsO 14000's stated purpose is to certify companies that "minimize harmful effects on the environment caused by [their] activities. Iso July 2003, over 53,000 companies worldwide had been certified under the ISO 14000 scheme.

¹⁰⁹ Id. at 1249-50 (quoting Steven A. Herman, It Takes a Partnership, 14 ENVTL. F. 26, 30 (May-June 1997)).

¹¹⁰ Bradley C. Karkkainen, Toward a Smarter NEPA: Monitoring and Managing Government's Environmental Performance, 102 COLUM. L. REV. 903, 959 (2002).

¹¹¹ ISO Website, Introduction, *at* http://www.iso.ch/iso/en/aboutiso/introduction/index.html (last visited Sept. 24, 2003).

¹¹² Id.

 $^{^{113}}$ ISO Web Site, supra note 111, ISO 9000 and ISO 14001 in Brief, $at\ http://www.iso.ch/iso/en/iso9000-14000/index.html (last visited Sept. 24, 2003).$

¹¹⁴ Id.

¹¹⁵ ISO/EMAS Chart, supra note 98.

However, only about 3,000 of these companies were American—U.S. companies may fear liability under American laws for not meeting the standards they commit to, or fear that disclosing internal environmental processes may land them in court or assist their competitors. ¹¹⁶ An additional drawback of the ISO approach is that the standards developed are "least common denominator' provisions… excluding third-party verification of reports and public rights to information." ¹¹⁷ The lowest common denominator problem is endemic in international agreements, ¹¹⁸ as we have seen with the weakened Kyoto standards designed to attract the United States. Another problem with voluntary schemes such as the ISO standards is that they "[tend] to lead to the selection of the most tractable issues, the ones most amenable to agreement" and not those public problems most demanding of resolution. ¹¹⁹

4.4. Corporate Statements of Principles

Another initiative is embodied in the CERES Principles, which are a set of corporate social responsibility standards devised in the wake of the Exxon Valdez disaster (and initially known as the Valdez Principles) by a coalition of industry and environmentalist groups. 120 A recent focus on socially responsible investing has prompted moves by many companies to join in such statements. 121 The heart of the CERES organization is a code of corporate environmental conduct called the CERES Principles; the group touts itself as "the worldwide leader in standardized corporate environmental reporting and the promotion of transformed environmental management within firms." 122 While most of the principles are largely just a set of values for corporations to accept, there are three principles that aim toward more substantive actions. Companies declare that among their principles are

¹¹⁶ Id.

¹¹⁷ Eric W. Orts & Kurt Deketelaere, Introduction: Environmental Contracts and Regulatory Innovation, in Orts & Deketelaere, supra note 10, at 16 (describing Cary Coglianese, Is Consensus an Appropriate Basis for Regulatory Policy?, in Orts & Deketelaere, supra note 10, at 110).

¹¹⁸ Cary Coglianese, supra note 10, at 108.

¹¹⁹ Id. at 107.

¹²⁰ CERES Principles, About Us: History, CERES website, supra note 8.

¹²¹ Id.

¹²² Id.

"informing the public," which involves seeking advice from community groups and a pledge not to take action against environmental whistleblowers; "management commitment," including choosing directors in part on their environmental credentials; and "audits and reports," including an annual self-evaluation, support for generally accepted environmental audit procedures, and annual completion of the CERES Report to be made available to the public.¹²³ The CERES Principles, and the coalition itself, bind together industry, environmentalists, advocacy groups, and investors.¹²⁴

The attraction of such corporate principles is not their enforceability, but that they reach deeply into corporate culture and can affect decision-making at all levels. Acceptance of the CERES Principles, or similar statements, should be a requirement of any private Kyoto prong.

5. A THIRD WAY FOR CLIMATE NEGOTIATORS

When and if the Kyoto negotiators reconvene, they should begin by reviewing these non-state actors' approaches to the problem of global climate change. They will find successes and failures, but a second front in the war on warming should be a voluntary program for businesses, including strong incentives to join and disincentives to ignore, environmental reporting and disclosure, independent auditing, environmental contracts that set firm emissions targets, and enforceability, either by government bodies or by environmental non-governmental organizations.

5.1. Incentives for Business Participation in Kyoto

Businesses should be willing to participate in a revised Kyoto Protocol purely out of self-interest. It should be clear by now that an international climate change regime is moving forward with or without American participation:

"[E]ven if climate change proves not to be the threat that some claim it will be, an entire international legal, political and economic structure is now being created. This

¹²³ CERES Website, Our Work: The CERES Principles, at http://www.ceres.org/our_work/principles.html (last visited Sept. 5, 2003).

¹²⁴ CERES Website, About Us: History, at http://www.ceres.org/about/main.htm (last visited Sept. 5, 2003).

structure will likely affect in a substantial way the global economic environment. And, notwithstanding the U.S. rejection of it, the American-based transnational corporation will surely operate [in the now 103 countries that have ratified the accord]."¹²⁵

Moreover, climate change, as described above, is shaping up to be a very real threat that could have an enormous impact on the world economy and may be worth businesses' attention for that reason alone. For example, in the past fifteen years, weather and climate-related events have cost the world an estimated one trillion dollars in economic losses. The insurance industry is particularly vulnerable, as evidenced by concern expressed by insurance giants Munich Re and Swiss Re, among others. 128

For skeptics among the business community, positive opportunities may be more enticing. The Bonn Agreements reached at COP 6 established three funds operating separately from the Global Environmental Facility ("GEF," the UNFCCC-created fund) to help finance projects implementing Kyoto's three mechanisms. As the world community moves forward under Kyoto, 30 U.S. non-participation will be an increasingly onerous problem for its multinationals. Kyoto's negotiators should consider making participation in development projects conditional on participation in the regime's management, auditing, and reporting schemes, or agreement to binding emissions reduction targets. Even the World Bank, increasingly concerned with its antienvironmental image, could make GEF, or other funding, contingent on some sort of "Kyoto certification."

Multinational corporations will have to live under stricter climate rules regardless of U.S. participation.¹³¹ American parent

¹²⁵ Perry E. Wallace, Global Climate Change and the Challenge to Modern American Corporate Governance, 55 SMU. L. REV. 493, 496 (2002).

¹²⁶ Id.

¹²⁷ Value at Risk, *supra* note 23, at 8-9.

¹²⁸ Id

¹²⁹ Wallace, *supra* note 125, at 507.

¹³⁰ Id. at 506-07.

¹³¹ See John F. Temple, The Kyoto Protocol: Will it Sneak Up on the U.S.?, 28 BROOK. J. INT'L L. 213, 245-46 (2002) ("In this way, American companies' significant capital expenditures have enabled them to extend their reach into numerous states and in the process, made themselves subject to the jurisdiction of these foreign states.").

companies in 1998 had 1,389 subsidiary companies in just three foreign countries: Britain, Canada, and Germany.¹³² These subsidiaries will be subject to the laws of the countries in which they operate, and those laws will be altered in order to implement the Kyoto Protocol. Having a chair at the table is critical for American MNEs.¹³³

Finally, corporations may respond to marketing incentives, such as green labels or green product marketing backed by official recognition from the climate regime. In a world of international consumers and borderless markets, such recognition is very important; the rise of a new wave of socially responsible investing highlights the importance of goodwill even if a company is not involved in consumer marketing.

5.2. Enforcement

A climate change lawsuit brought by Greenpeace and Friends of the Earth ("FOE") is a good example of how NGOs can serve a vital enforcement role in world affairs, even where the national government refuses to take action. U.S. federal agencies are required by the National Environmental Policy Act ("NEPA") to review the possible environmental consequences of their actions, and if such consequences will be significant, prepare an Environmental Impact Statement. Citizens have the authority to sue the government to enforce these requirements. The lawsuit filed by Greenpeace and FOE contends that two U.S. agencies, the Export-Import Bank ("Ex-Im") and Overseas Private Investment Corporation ("OPIC"), have ignored their duties under NEPA. The outcome of the lawsuit is important: the projects funded by Ex-Im and OPIC include major fossil fuel extraction projects led by,

¹³² Id at 246-47.

¹³³ See Wallace, supra note 125, at 513 ("Thus, today, a corporation adopting such a traditional model must, at a minimum, engage employees, consumers, suppliers, non-governmental organizations, governments and others, in order to shape the economic environment and thereby enhance corporate profits and shareholder wealth.").

¹³⁴ National Environmental Policy Act, 42 U.S.C. § 4332 (2003).

¹³⁵ Id.

¹³⁶ See 2 Western Cities, supra note 84 ("The lawsuit contends that the agencies ... have provided \$32 billion in financing and insurance over the last 10 years for fossil-fuel extraction projects overseas ... without assessing the contribution those projects make to global warming.").

among others, ExxonMobil.137

This "private attorney general" or "citizen suit" function is important in U.S. federal law, as NGOs have been able to enforce a variety of other environmental laws such as the Endangered Species Act and Clean Water Act through these mechanisms. Such a mechanism can be employed in a new prong of the Kyoto Protocol, perhaps by including elements in voluntary agreements that provide for arbitration before international panels and grant NGOs the power to bring such actions. If a company loses before such a panel, it could lose its Kyoto certification and face penalties including losing its ability to participate in development projects or utilize "ecolabels." While voluntary measures are important and some protection should be afforded companies who voluntarily join, there must be independent means for checking compliance and, if necessary, enforcing it. NGOs can help with this task.

6. CONCLUSION

In sum, the Kyoto Protocol is incomplete if it does not have the ability to reach beyond national sovereignty and into all areas of human economic activity. In order to broaden its reach, the international climate regime must include new tools to attract MNE and NGO participation. These tools may include environmental contracts, audits and disclosures, management systems, and statements of principles. Whatever is adopted must be binding and enforceable; the incentives to join must be powerful. By adopting a range of innovations and not simply relying on one tool, such as regulation, the Kyoto regime will be able to influence behavior at many levels. This may be the most important aspect of the tools discussed above: the solution to the climate change problem must involve a complete evolution of corporate and individual thinking on environmental issues. These tools may bring about a sea of change because they involve the very basics of commercial behavior. Rather than a too-great emphasis on either domestic regulation or unfettered capitalism, a third, more cooperative, more effective, more complete way to deal with climate change can, and must, emerge.

¹³⁷ *Id.; see also* Greenpeace Website, Lawsuit Against the U.S. Government (detailing the elements of the lawsuit against the U.S. Government), *at* http://www.greenpeaceusa.org/bin/view.fpl/7096/article/418.html (last visited Aug. 28, 2003).