Low Carbon Society Project





Report to Natural Resources Canada on Post Workshop Development of Phase II and III Activities

A previous report ("H2 Governance: Exploring Paths to a Low-Carbon Society" Workshop Summary, July 2006) has reviewed the conclusions flowing from an October 2005 workshop organized by the University of Victoria at Dunsmuir Lodge to address the social and governance challenges of transition to a hydrogen economy. As noted in that report, one central conclusion flowing from the workshop discussion was that a more general characterization of the question, addressed to the social challenges of transition to a low carbon society, would be appropriate.

Since completion of that October 2005 workshop there have been extensive discussions with academic colleagues and potential sponsors of an extended research program dealing with topics identified in the workshop, as described below. Other follow-up activities have also been pursued:

- The summary report on the workshop has been completed and is being distributed to workshop sponsors
- A project website has been established (<u>www.H2governance.org</u>) and will be maintained as a source of workshop papers and materials, and subsequent research and policy-related materials
- In addition, links with industry groups and associations have been pursued. Submissions outlining the workshop results and project plan have been made to BP and Chevron, and a presentation made to Shell Canada in Calgary. While no industry financial support has yet been confirmed, there is clear interest in the topics identified.
- Strong support in principle for a follow-up program has been expressed by the Executive Vice-President of SSHRC, the original workshop sponsor.

As a result of our post-workshop consultations and academic discussions, the original proposal for a two-track, three year program that emerged from the workshop itself has been dramatically rethought. A revised summary flow chart has been prepared and is attached.

In this revised framework the emphasis is specifically on the issue of 'climateconstrained energy policy' in a global setting. This research reviews the constraints stemming from concerns about the risks of fundamental change in the earth's atmosphere as a consequence of greenhouse gas emissions, and explores implications for energy policy. The goal is characterization of a global bargain with respect to emissions limits that could be seen—in light of accommodating compensatory measures—as mutually advantageous. More particularly the focus will be on the barriers to effective collective action that appear to erode or offset any political will either to enter into the necessary binding commitments or to take the action necessary to realize the intention of such commitments. (Beyond regulatory measures directed toward behavioural change to bring about reduced emissions, of course, such action might include greater incentives for development of new technologies for direct carbon capture, management and storage.)

The rationale for this orientation for the research proposal can be found in part in recent statements by influential leaders in the energy sector itself.

In a recent keynote address to the International Energy Forum (22 April, 2006) Lord John Browne, CEO of BP, commented on the challenge of energy security. He observed that "Security can only be sustained if the relationships on which it is based are founded in the principles of mutual advantage", and went on to suggest that security challenges are back on the agenda now because of renewed growth in demand and increased trade, but also because of "growing concern about the impact on the natural environment of increased consumption of hydrocarbons, and in particular about the risks of a fundamental change to the earth's climate." As one of four steps that should be taken in response, he suggested that "The science of climate change may still be incomplete, but the evidence is mounting...The case for precautionary action is very strong..." (emphasis added).

In conclusion he noted that "These are complex issues. But the key point is that they represent common goals....If we can pursue these goals successfully I believe we can achieve a position of mutual advantage...."

What would be the character of precautionary action that could be seen as leading to a position of mutual advantage, given the profound uncertainties surrounding the scale— and more particularly the distribution—of the risks involved?

What manner of compensation could the winners from such action offer—and deliver to the losers, in order to achieve agreement?

How can the barriers to collective action in sustaining such an agreement be overcome?

At least since the pathbreaking work of Mancur Olson in the mid-sixties there has been awareness that there are problems in which outcomes that would be in the interest of everyone can not be achieved because rational individual agents will not see it as in their interest to take the necessary action. Action that would leave everyone better off is not achievable because familiar barriers to collective action cannot be overcome without conscious cooperation among individual actors who are prepared to commit themselves to joint initiatives from which there will always be an individual incentive to defect.

Measures to protect the global public commons that is the Earth's atmosphere have long been recognized to encounter these standard barriers to collective action. The global

public goods flowing from ecological services that rest on the sustained integrity of atmospheric, marine or terrestrial ecosystems can not be assured in the absence of sustained cooperation and willingness of individual agents to honour commitments made in the past under different circumstances and in the light of different knowledge.

So there are two distinct problems. The first is to identify a stable configuration of commitments to action that will be accepted as an outcome offering a position of mutual advantage while sufficiently addressing the underlying environmental challenges. The second is to know how to get to such a position through the coordination of individual action—or at least through mobilization and animation of coherent individual action—in the case of the global atmosphere, through individual action at national scale.

And from this last observation—that commitments to such a pact or covenant are likely to be made by national authorities—there follows a third, equally crucial, challenge. That is to ensure that the decision processes involved are accepted as legitimate by the individual economic agents and individual citizens whose compliance is essential to realization of the intended action, even in the face of adverse outcomes flowing from that action, at least in the short run.

There is a vast literature bearing on all these issues, with increasing analytical attention turning to the challenges of achieving sufficient credibility and legitimacy to support sustained commitments to faithful interpretation and implementation of intentions expressed in negotiated general covenants, but realized through the agency of individual actors on the ground, at the margins of human activity.

The Centre for Global Studies believes, despite the extent of the work already completed and underway in many places, that there is an aspect of the work in which it may have a unique opportunity to contribute to the discussion. This opportunity arises from its extensive prior work and experience in the development and assessment of institutions of governance, both at global scale and with respect to the cross-scale issues that arise in bringing national interests together in global covenants and in bringing the intentions of such covenants into action toward realization at national and sub-national scale.

In particular, extensive work with the L20 discussions and the networking of supporting think-tanks or analytical initiatives provides a foundation for cooperative work on efforts to develop solutions offering mutual advantage in the specific case of climate policy, identified in recent L20 discussions as a topic in which further work on social and governance challenges is essential.

At global scale, such multilateral accords inevitably demand creative approaches to mutually advantageous linkage. Two decades of work on global atmospheric issues have already made clear the need for an innovative 'grand bargain' at global scale. They have also made clear the temptations open to 'free riders' and the payoffs to 'defectors' at the level of the bargain itself, as well as the almost insurmountable barriers to negotiation of local implementation action that offers any fidelity to the text of the covenant expressing that bargain. The proposal for the present three-year work program envisages an interactive process that emphasizes the need for development of a general covenant reflecting particular needs of individual nations, and respecting the particularities of place in the implementation action demanded. (A lesson increasingly cited from work on integrated ecosystem management is the need to be able to scale decision-making processes to the extent of the ecosystem concerned. This lesson shapes this aspect of the research proposal here.)

In this program, the CFGS is establishing a Canadian team to work with a small number of other national teams based in national think-tanks with whom the CFGS principals already have an established working relationship. The program will support a continuing interactive exchange punctuated by more inclusive workshops. It will be directed toward identification of national positions that might be carried into the formation of a coalition strong enough to negotiate a global bargain seen both as mutually advantageous and as legitimately derived through procedures sufficiently broadly acceptable to concerned civil society actors as well as business and government officials.

To determine what is of advantage in any national setting itself can be only an educated guess, of course, premised on a shifting knowledge base, and taken in the face of profound uncertainty about future events and future context. Decisions now must be taken in recognition of the extent to which they may constrain future decisions as new technological, institutional and social opportunities emerge over the three or four decade horizon that is relevant in such discussions.

The challenge of anticipating the emergence and diffusion of new technological options is obviously substantial. Knowing what might be an advantageous decision to adopt new technological possibilities is hard. But the difficulties of identifying what technological options open up advantageous steps toward reduced emissions are dwarfed by the challenges of overcoming the institutional, social and psychological barriers to introduction of such innovations.

This is where the program proposed by the CFGS, based on animation of an interactive exchange among locally-based research groups specializing in institutional analysis and features of polycentric governance, offers opportunities to develop policy-relevant proposals not likely to emerge in much larger but more focused research initiatives.

The first element in the initial work of such a program, exploration of domestic policy issues shaping national policy positions, has been the subject of considerable preparatory organizational discussion:

- Dianne Cunningham of the University of Western Ontario Lawrence Centre in the Ivey School of Business is planning the next workshop in the proposed research program in October, 2006
- David Keith has agreed to pursue possibilities to organize the subsequent workshop in the series at the University of Calgary

- Contact has been made with potential sponsors to commission 'evergeen' briefing notes on selected topics to be maintained as a coordinated briefing book to provide background to participants in future workshops and to senior decision makers in participating countries; two such papers have been commissioned; conclusion of arrangements for commissioning of others by Industry Canada and by Natural Resources Canada is pending; (the covering note and revised draft list of initial papers proposed by Harry Swain is appended to this report)
- Professor Ted Parson, whose book on climate policy has recently been published by Cambridge University Press, has agreed to spend an academic sabbatical year with the CFGS in 2006/7, and to act as research advisor to the program and with responsibility specifically for intellectual direction of work on the continuing briefing book
- Harry Swain, Executive Director of the Pacific Climate Impacts Consortium, has pursued discussions with officials involved in high-level programs at OECD on emerging technological possibilities and policy implications.

The second element, relating to potential roles for Canada in promoting global transitions toward a low carbon society, has been developed in less detail thus far. It will attempt to reflect potential Canadian contributions to international diffusion of knowledge relating to relevant technological innovation and development, and possible Canadian contributions to support technical and institutional capacity-building in developing countries (in effect, looking at what Canada might bring to the table as part of a global bargain). It will also examine possible transfers of policy learning from Canadian experience, and mutual learning from exchange of experience and collaborative networked research, all directed toward means to overcome institutional barriers to effective regulatory or policy action as well as to timely decisions on adoption of new technologies (in effect, asking why we can't seem to do the right thing even when we think we know what that is).

But the focus will be on the institutional barriers to achievement of an appropriate multilateral covenant and implementation of its intent.

The program design is based on work with national teams exploring the particular circumstances of the participation of their own countries in international negotiations toward a global covenant. With respect to this second, globally-oriented component of the proposed research program, a number of preliminary activities have been pursued:

- Discussions of research definition and design have been organized with CIDA officials and Canada's High Commissioner in London (exploring also in a preliminary way possibilities for collaboration with the Institute for Research in Public Policy)
- The opportunity was seized for discussions with participants in an L20 meeting in Maastricht
- Correspondence with Richard Isnor of IDRC, and discussions in London and Maastricht concerning the terms of a possible proposal for support under the IDRC Challenge Program have suggested a promising network structure for the work

- In addition to David Keith and Ted Parson, as noted above, Hadi Dowlatabadi, Canada Research Chair at UBC, has agreed to participate in this project as it develops
- David Victor of Stanford University has agreed to lead a US group in this work. Discussions with potential Southern academic and think-tank partners suggested by Victor is now in train.

By embedding the discussion of national policies within the context of global negotiations designed to overcome the array of barriers to collective action and global commons problems, this project design will carry the underlying analytical work into the sphere of concrete application and action. Over the summer 2006, research teams and think tank representatives from developing countries will work with us to organize later exercises exploring negotiating positions and potential compensation agreements in the development of possible global bargains underlying a post-Kyoto architecture.

ANNEX I—Summary Flow Chart for Research Program ANNEX II—Note on Evergreen Briefing Book

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