

A CHANGING WORLD: CANADIAN FOREIGN POLICY PRIORITIES

No. 2

CIC

CANADIAN INTERNATIONAL COUNCIL
CONSEIL INTERNATIONAL DU CANADA

THE NEW GLOBAL ENERGY GEOPOLITICAL GAME: IS CANADA READY TO PLAY?

Annette Hester

January 2009

Canadian International Council
www.canadianinternationalcouncil.org

Conseil international du Canada
www.conseilinternationalducanda.org

ABOUT THE AUTHOR

Annette Hester, MA (Econ.), works in association with the Centre for International Governance Innovation in Waterloo, the Canadian International Council, the Centre d'études interaméricaines at Université Laval and is a Senior Associate with the William E. Simon Chair in Political Economy at the Centre for Strategic and International Studies, in Washington, D.C. She was also the founding director of the Latin American Research Centre at the University of Calgary. She has extensive experience as a consultant, acting as a liaison while developing international market strategies for leading oil, gas and energy companies in North and South America. She has co-edited a volume on the energy integration in the Western Hemisphere and is the author of numerous articles on oil and gas trade relations and regulatory environments in Canada and Latin America published in *Oil and Gas Journal*, *Estey Journal* and the *Journal of Canadian Petroleum Technology*. She frequently contributes to newspapers including the *Globe and Mail*, the *Financial Post*, and the *Calgary Herald*.

ACKNOWLEDGEMENTS

My task was to write about Canada's international energy policy - a daunting assignment given the scarcity of information on the subject. I began in Ottawa, where a generous Sarah Fountain Smith from DFAIT gathered together a few key individuals from her department and from the NRCAN for a conversation.

Next stop, Washington D.C, where a helpful Susan Harper at the Canadian embassy brought together everyone involved in the Canada-US energy file for a rich and informative discussion, and a "eureka" moment courtesy of Guy Saint Jacques, who is now second in command at the embassy, but formerly with DFAIT's energy secretariat. He remarked that the shift from "market primacy" to the increasing political negotiations required in the energy file reminded him of times past. Perhaps, he suggested, we will go back to our historic norm of politics shaping markets.

Full of ideas I hurried to CSIS, where my colleagues in the energy program were at the ready for our usual spirited exchanges. It was Sarah Ladislaw, however, who helped me shape the conceptual framework for this paper. Then I embarked on a summer of researching and writing. I relied on the good will and generosity of many special individuals, most of whom are not quoted in this work. Nonetheless, without their ideas and prompting, I would have not been able to push the envelope. Thus, a special thanks Trevor Findlay, Liz Dowdeswell, Louise Frechette, Ernie Regehr, Derek Burney, Gerry Protti, John English, Hugh Segal, Hal Kivslie, Bob Church, Eddie Greenspon, John Ibbitson, Jennifer Welsh, Stephen Handelman, Jonathan Fried, Bruce Doern, Paul Doherty, Aldyen Donnelly, the R.H. Paul Martin, the R.H. Peter Lougheed, Ambassador Michael Wilson and many government officials who shall remain unnamed.

It was the insightful work of reviewers that forced me to take a solid first draft and make it into a much better work. I must thank Joe Doucet and David Bercuson (and an anonymous peer). And I owe a debt of gratitude to Sidney Weintraub and Robert Bothwell for their detailed comments and care they always show towards me. Finally, a sincere thanks to the CIC for giving me the opportunity to take time to ponder.

The opinions expressed in this paper are those of the author and do not necessarily reflect the views of the Canadian International Council, its Senate or its Board of Directors.

If you would like to download a copy of this report please visit www.canadianinternationalcouncil.org

ISSN 1918-803X

© 2009 Canadian International Council

EXECUTIVE SUMMARY

This paper conducts an enquiry into Canada's foreign energy policy, and suggests that the design of a grand energy strategy is paramount to the construction of such a policy. The analysis that follows, of whether such strategy exists and what elements should be included in one, is framed by examining the position of the US, Canada's largest energy customer and trading partner, in the evolving world of energy geopolitics.

Detailed analysis of the current global energy scenario and the historical evolution of American relations with the Middle Eastern powers lead to the conclusion that with time, the US will have to relinquish its dominant position as defender of free passage through the Strait of Hormuz and refocus its attentions from that region to the Western Hemisphere, whose energy potential is still emerging.

In this scenario, Canada's bountiful energy endowments make it a key player. Nonetheless, there are substantial challenges to transforming these resources into a source of prosperity. The roadblocks vary in nature. Some, such as the environmental footprint of oil sands production, require technological breakthroughs, while others, such as the jurisdictional challenges inherent in provincial ownership of resources, are solely political. Adding to these difficulties is the fallout of the last National Energy Program (NEP), a policy put forth by Pierre Trudeau in the mid-1980s, which still affects much of the national debate. In fact, the current energy policy as stated by the Department of Natural Resources offers the same prescriptions as the policies of the Mulroney government, put in place in response to the NEP. Yet, it is a much different world that confronts Canada now.

This paper argues that to overcome these challenges the Prime Minister must define a clear vision and craft policies to achieve these goals, starting with the coordination of a national plan that reconciles energy and environmental policies. The development of a policy for the sustainability of hydrocarbon resources is central to this initiative because any country that comes up with new ideas and technologies to use, store and dispose of carbon will lead the way into the future. Canada should – and can – become the nation to tell the world “the 1001 ways of using carbon.” Related policies can then be judged by whether or not they make a contribution to the sustainability of hydrocarbon resources.

This will only come to fruition if a technological leap can be engineered – and the best model, this paper argues, is to follow the structure put in place by Alberta Premier Peter Lougheed, in the creation of the Alberta Oil Sands Technology Research Authority (AOSTRA), where his government partnered with other levels of government and private enterprise to bring about the advancements in technology development.

Once there is a national plan, the Prime Minister can move to the international scene by establishing strong partnerships that can provide the basis for Canada's leadership in the energy sector, from the Arctic to the southernmost tip of the Western Hemisphere. There is a need to create a constructive energy architecture, which would include, among other initiatives, the creation of a forum where discussions on the future stewardship of our shared environment would take place.

This paper concludes by suggesting that although it is uncertain how long it will take for the US to reposition itself, it will eventually do so. And when that happens, the perceptions of Canada by our neighbours, close and afar, will depend solely on what Canada chooses to do. The stakes are high, but then so is the prize – prosperity in a peaceful and sustainable world.

SOMMAIRE EXÉCUTIF

Dans cette étude consacrée à la politique énergétique étrangère du Canada, il est jugé indispensable qu'une telle politique repose sur une stratégie énergétique globale. L'analyse qui s'ensuit tente d'établir si le Canada dispose vraiment d'une telle stratégie et de définir les éléments qu'elle devrait comporter, cela en s'appuyant sur la situation des États-Unis – premier client du secteur canadien de l'énergie et principal partenaire commercial du Canada – dans le monde en mutation de la géopolitique énergétique.

Selon une analyse détaillée de la situation énergétique mondiale et de l'évolution historique des relations entre les Américains et les puissances du Moyen-Orient, les États-Unis devront tôt ou tard renoncer à la position dominante qu'ils occupent en tant que défenseurs du libre passage du détroit d'Ormuz, puis recentrer la priorité qu'ils accordent à cette région vers un hémisphère occidental dont le potentiel énergétique est encore en émergence.

Compte tenu de cette situation, les abondantes richesses énergétiques du Canada en font un acteur clé du domaine. Mais notre pays doit encore relever d'importants défis pour transformer ces richesses en sources de prospérité. Les obstacles sont nombreux et variés. Certains, comme l'empreinte écologique de l'exploitation des sables bitumineux, nécessiteront des percées technologiques. D'autres, comme les enjeux de compétence liés à la propriété provinciale des ressources, sont surtout politiques. S'y ajoutent les retombées du dernier Programme énergétique national (PEN), une politique établie au milieu des années 1980 par Pierre Elliott Trudeau, qui nuisent encore aujourd'hui au débat national sur la question. En fait, telle qu'elle est définie par le ministère des Ressources naturelles, l'actuelle politique de l'énergie repose sur les mêmes conditions que les politiques adoptées par le gouvernement Mulroney en réponse au PEN. Or le Canada évolue désormais dans un monde très différent de celui de cette époque.

Pour relever ces défis, avance-t-on dans l'étude, le premier ministre canadien doit définir une vision claire et concevoir des mesures pour atteindre les objectifs qui fondent cette vision, à commencer par la coordination d'un plan national assurant la concordance des politiques énergétiques et environnementales. L'une des mesures décisives de ce plan devra prévoir des politiques de durabilité des ressources en hydrocarbures, puisque tout pays qui produira de nouvelles idées et technologies d'utilisation, de stockage et d'élimination du carbone s'imposera demain comme chef de file. Le Canada devrait et pourrait tout à fait devenir ce pays qui enseignera au monde les « 1 001 façons d'utiliser le carbone ». Toutes les politiques connexes pourront alors être évaluées selon leur capacité d'assurer la durabilité des ressources en hydrocarbures.

Cette finalité ne pourra s'accomplir sans un bond technologique dont le meilleur modèle, soutient l'étude, réside dans la structure mise en place par le premier ministre albertain Peter Lougheed avec la création du Bureau de recherche et de technologie des sables bitumineux de l'Alberta (AOSTRA), qui a donné lieu à un partenariat entre cette province, les autres ordres de gouvernement et l'entreprise privée en vue de stimuler le développement de progrès technologiques.

Une fois que nous disposerons d'un plan national, le premier ministre canadien sera en mesure d'établir de solides partenariats internationaux qui jetteront les bases du leadership du Canada dans le secteur énergétique, de l'Arctique à l'extrême sud de l'hémisphère occidental. Et pour ce faire, nous devons élaborer une architecture énergétique constructive qui prévoie notamment la création d'une tribune où débattre de la gestion future de notre environnement partagé.

Il reste à déterminer le temps qu'il faudra aux États-Unis pour se repositionner, conclut-on, bien que cette échéance soit inévitable. La perception qu'auront alors du Canada nos voisins proches ou éloignés dépendra essentiellement des choix que nous faisons. L'enjeu est majeur, tout comme les fruits que nous pourrions en récolter, à savoir une prospérité soutenue dans un monde paisible et viable.

TABLE OF CONTENTS

Page

About the Author and Acknowledgements	
Executive Summary	
Table of Contents	
Introduction	1
Step I: The Global Geopolitics of Energy, 2008	3
The Saudis up the ante...	3
The US reacts...	3
Suddenly Russia resurfaces...	4
But then, China rises...	5
Still, Russia and China are not alone...	6
Step II: The US strategy from way before Jimmy Carter...	7
Step III: Translating strategy and history into the present	10
About the Americas	11
Step IV: The Canadian Story	13
Step V: Canada's energy policy	15
All about now	17
The Alberta Story...	18
On international energy policy...	22
The present...	22
The Current State of Affairs: Canada's international energy policy or all about Canada as an Energy Superpower	22
Step VI: The Grand Energy Strategy	24
Now, an international energy policy...	25
Step VII: In the end	26
Acronym List	27
Bibliography	28
About Us	

THE NEW GLOBAL ENERGY GEOPOLITICAL GAME: IS CANADA READY TO PLAY?

Annette Hester¹
CIC Research Associate

INTRODUCTION

The global energy scene is changing and becoming increasingly complex. While nuclear energy, coal and wind-power, not to mention bio-fuels, have a part to play, oil remains the single most important primary source of energy in the world. Where supply was once taken for granted, now we can see the end of easily accessible cheap oil and the limitations and challenges imposed by more complex production and environmental concerns. Where once there were only a few key players who ran the show, now the competition for access to resources is multilateral and fierce.

Today, developed countries are not the only ones driving demand. There are thirsty new powers, particularly China and India as well as many smaller developing countries, with steadily increasing energy demands. Resources are harder and costlier to find, produce and bring to market. There is an unrelenting transfer of resource ownership from the Western-based market-oriented companies to state-owned companies of all stripes. The five supermajors – Exxon Mobil, Chevron, Shell, BP and Total – are responsible for less than 15 percent of total oil production, and state oil companies and foreign ministries now control approximately 80 percent of the world's conventional oil reserves.²

In 2002, after a decade and a half of relative stability, oil prices began climbing. In July of 2008 crude oil traded at a staggering US\$145 per barrel.³ The record price sent shock waves across the globe. Fortunately, most countries were better prepared than the previous time prices shot up. Not two months later, prices plummeted. By mid-November, in the wake of the US financial sector meltdown,⁴ prices dropped to US\$55 per barrel. Still, the new lows are higher than ever and the impacts of this volatility are being felt throughout the global economy.

The world as we have known since oil first became a prize commodity in the early 1900s is in flux and Canada is well positioned to become a key player. As Prime Minister Stephen Harper points out, the country's energy resources are impressive. In 2008, he stated:

Our country is seventh in world oil production, with the second largest proven reserves in the world. We're 11th in the world coal production, third in the production of natural gas, first in the production of hydroelectricity and first in uranium.⁵

¹ Annette Hester is a Senior Fellow at the Centre for International Governance Innovation, Senior Associate with the William E. Simon Chair in Political Economy at the Centre for Strategic and International Studies and Founding Director of the Latin American Research Centre at the University of Calgary. She is also a 2008-2009 Canadian International Council Research Associate.

² These statistics are agreed upon by experts from the Center for Strategic and International Studies and Cambridge Energy Research Associates, both in the US, as well as the International Energy Agency.

³ Unless mentioned otherwise, all funds are in Canadian Dollars.

⁴ On 15 September 2008, the prestigious Wall Street firm, Lehman Brothers declared bankruptcy. The announcement came at the same time Merrill Lynch was purchased by Bank of America, shortly after the rescue of institutional mortgage lenders Freddie Mac and Fannie May by the US government and the 16 March 2008 bailout of Wall Street's Bear Stearns. These events marked the beginning of a global financial crisis which, at end of December 2008, is still unfolding.

⁵ Stephen Harper. "Address at the Canada-UK." Chamber of Commerce. (London, England: 29 May 2008).

So far, this is a good story. Activity and revenues from the sector provide crucial balance to the beleaguered manufacturing sector, the historical engine of the Canadian economy.

Nonetheless, there are many challenges ahead. Canada is a large oil producer, but too small to influence prices on a global scale. Resources fall under the purview of provincial governments, leaving little play for the federal government. In fact, not even provincial governments have full control. Ultimately, it is the private sector that undertakes all related activities – from exploration to delivering product – at the pump. Furthermore, virtually all of the country's energy exports go to the US, and strict trade rules set originally in the 1989 Canada-United States Free Trade Agreement (CUSFTA) and then extended to the North American Free Trade Agreement (NAFTA),⁶ limit the Prime Minister's options. In addition, most of the incremental oil production will likely come from oil sands, a source with a large environmental footprint. And finally, there exists in Canada an almost fanatic devotion to the concept of free markets that might handicap thinking – because as this story will tell, there is little free about energy markets.

With such challenges, continuing to translate Canada's bountiful endowments into prosperity will take much skill. It will take understanding the evolving geopolitics of energy and the strengths, weaknesses and strategy of the established and up-and-coming power players. It will take being able to anticipate their moves, and then, having courage and wisdom to act when appropriate, and to always respond constructively. While these are all necessary actions, ultimate success will depend on the government's ability to design and implement a grand strategy.

In discussing the question "Is there a Grand Strategy in Canadian Foreign Policy?" David Pratt, former Defence Minister, likes Yale University historian Paul Kennedy's definition:

The crux of grand strategy lies therefore in policy, that is, in the capacity of the nation's leaders to bring together all of the elements, both military and nonmilitary, for the preservation and enhancement of the nation's long term best interests... it operates at various levels, political, strategic, operational, tactical, all interacting with each other to advance the primary aim.⁷

Or in Mr. Pratt's own words "a grand strategy is nothing more than a state's long term plan to survive, and, where possible, to thrive."⁸

In the context of this paper, an enquiry into Canada's foreign energy policy, it is then paramount to question if Canada has a grand energy strategy and if not, to suggest why it is necessary and what it should be. It is only with this knowledge at hand that a foreign energy policy can be constructed.

While the discussion of a Canadian energy policy framework must include national views of energy security, access to markets, regulatory constructs, and the challenges posed by the federal-provincial division of powers, key to any Canadian domestic and international energy policy is the country's largest energy customer, the US. Consequently, all the elements germane to American strategic interests and position vis-à-vis the energy file must first be analysed, as they frame Canadian energy history, policies and future strategy. Still, powerful as the US might be, its interactions with the world define its energy outlook and subsequently, its policies. This being the case, an examination of the global energy picture seems like a logical place to begin this journey.

⁶ The Canada – United States Free Trade Agreement was signed in 1988 and went into effect on 1 January 1989. NAFTA, which included Mexico, was launched in January 1994. A number of clauses dealt with energy, including prohibitions against imposition of price controls on oil and natural gas, the enactment of a differentiated pricing system and the reduction of exports by less than 20 percent of supplies, which is calculated as an average of the previous 36 months. Moreover, exceptions based on national security issues are restricted to armed military conflict.

⁷ David Pratt. "Is there a Grand Strategy in Canadian Foreign Policy?" *Journal of Military and Strategic Studies*. Lecture Three: Ross Ellis Memorial Lectures. 20, is. 2. (Winter 2008): 15.

⁸ David Pratt. "Is there a Grand Strategy in Canadian Foreign Policy?"

STEP 1: THE GLOBAL GEOPOLITICS OF ENERGY, 2008

Although 2008 marked the seventh consecutive year that oil prices increased, the first six months of the year marked an even more worrisome trend. Prices soared from an average of US\$92.97 in January, to US\$105.45 in March and to over US\$130 in June (price per barrel).⁹ The seemingly unrelenting rise in prices turned players and markets jittery.

The Saudis up the ante...

Saudi Arabia, the world's leading oil producer and exporter, made the first move.

Worried about a replay of the 1970s fuel crisis,¹⁰ when a sudden and severe rise in prices triggered a virtual revolution in oil markets, Saudi Crown Prince Abdullah hastily convened a global energy summit in June 2008. The last thing the Saudis wanted was for soaring oil prices to encourage conservation, an increase in non-Organization of the Petroleum Exporting Countries (OPEC) and unconventional production, and massive investments in the development of alternative energy sources. Last time these factors played a crucial role in the steep decline in demand for oil. The 23 June meeting only served to confirm that the traditional power players were not in control. Although it is hard to define who was in control, it is known that producers had little, if any spare capacity, and the only concrete measure was an agreement by Saudi Arabia to increase production by 200,000 barrels a day. Markets barely reacted to the news. The following Monday, oil opened in Singapore at US\$135.72, a slight increase from Friday's US\$ 135.47 New York close.¹¹

The US reacts...

These events spelled much trouble for the US. As the world's largest consumer, accounting for 25 percent of global oil demand, and the only remaining superpower, its position was now hugely vulnerable. Although the country still ranks amongst the globe's three largest producers, it imports almost 60 percent of the oil and petroleum products it needs to fuel its economy. Its share of global production, however, has declined steadily in the last three decades, from an average of 20 percent in the 1970s to only 8.4 percent in 2007, thus adding to the country's oil-related challenges.¹² In short, from a supply perspective the American leverage in global markets has decreased significantly.

At the same time, energy security has risen to the top of the national agenda. Jay Hakes, who in the 1990s headed the Energy Information Administration (EIA) in the US Department of Energy, and since 2000 has served as Director of the Jimmy Carter Presidential Library and Museum, suggests that oil and energy security were likely the *raison d'être* for the Iraq war. During this war, American and British companies took over the coveted oil fields that had been out of their reach since the nationalization of Exxon and Mobil's properties prior to the 1972 oil embargo.¹³ It also opened the door to massive subsidies for the agriculture and fuel distribution sectors which produce and blend corn-based ethanol. These factors significantly contributed to a burgeoning budget deficit, which in turn, further weakened the American economy.¹⁴

⁹ "Petroleum Navigator." Energy Information Administration. (Washington, D.C.), <http://tonto.eia.doe.gov/dnav/pet/hist/rwtcM.htm>.

¹⁰ In the 1970s, the emergence of OPEC and the Iran-Iraq war brought about two oil crisis which sent prices soaring from a historical low in 1970 at US\$9.65, to US\$48.92 in 1974, and later, to a record US\$93.08 in 1980 (measured per barrel in 2007 dollars). A series of measures, including the ones mentioned in the text, contributed to a decline in demand. By 1986 prices began to drop. From that year on, the average price of oil for the next decade and a half was US\$27.55 (measured per barrel in 2007 dollars). Calculated from BP "Historical Statistics 2008 edition." <http://www.bp.com/productlanding.do?categoryId=6929&contentId=7044622>.

¹¹ Robert Worth and Jad Mouawad. "Agreements are Elusive at Oil Talks in Saudi Arabia," in *New York Times*. (23 June 2008).

¹² Calculated from BP "Historical Statistics 2008 edition." <http://www.bp.com/productlanding.do?categoryId=6929&contentId=7044622>.

¹³ Jay Hakes. *A Declaration of Energy Independence*. (John Wiley & Sons, Inc, Hoboken: New Jersey, 2008): 98.

¹⁴ Aside from the burgeoning deficit, the US economy showed significant weaknesses in the financing of mortgages, when the extent of the sub-prime crisis started to emerge.

Democrats and Republicans responded with a rallying cry for energy independence. Disturbingly, Americans equate domestic production with energy security, which is simply an untenable proposition. The great majority of experts agree that in the short and medium terms, there is no way to meet current consumption domestically – not even with efficiency gains, conservation, increased production and alternative fuels combined.¹⁵ Frank Verrastro, the head of the energy research group at the Centre for Strategic and International Studies in Washington, D.C., puts it best: “Energy independence is a) an attractive political slogan, not a policy, and b) totally unrealistic anytime soon and probably undesirable. The problem is most political polling shows a high (80%) favorable rating to the idea.”¹⁶

The disconnect between public perception and American energy realities goes further: encouraged by the political rhetoric that stresses the need of independence from Middle Eastern oil,¹⁷ and by energy experts’ focus on that region and the Caspian Sea, few Americans are aware that the Western Hemisphere actually delivers 54 percent of American imported oil and products. In contrast, the Middle East supplies a paltry 16 percent, of which Saudi Arabia alone delivers 11 percent. If the Western Hemisphere comes up in political discussion at all, it is mostly in the context of Venezuela’s mercurial President Hugo Chavez or more recently, in reference to Canada’s dirty oil sands. The confusion surrounding Canadian oil is even greater. While Canada is America’s top crude supplier, and the true deliverer of energy security, even US legislators have joined environmentalists in attacking the oil sands.¹⁸

Energy independence and forsaking Canadian unconventional oil are incompatible goals. As leaders confront the inevitable trade-offs between “environmentally preferable” versus “economically possible” in contrast to confrontation and isolationism, it is dialogue, coordination and accommodation along all levels of government and domestic and foreign stakeholders that is needed.

Until American rhetoric changes, it is an insecure US that faces the world. And an insecure US is a protectionist US. This is, perhaps, one of the worst possible scenarios for the rest of the world, and particularly for Canada – America’s largest trading partner. Furthermore, scholars have pointed out for more than a year that the era of market primacy is coming to an end.¹⁹ Throughout the financial sector meltdown, it is clear that this is the case. Yet only a few months ago, at least in the energy sector, most North Americans still believed that it was business as usual.

Suddenly Russia resurfaces...

Any thoughts in this vein ought to have been dispelled by the sight of Russian tanks rolling into Georgia in early August 2008. The move, likely ordered by Prime Minister Vladimir Putin, who tag-teams with President Dmitry

¹⁵ National Petroleum Council. “Hard Truths: Facing the Hard Truths about Energy.” A NPC Report, <http://www.npchardtruthsreport.org> and *The Global Politics of Energy*, edited by Kurt Campbell and Jonathan Price. (Washington D.C.: The Aspen Institute, 2008).

¹⁶ Frank Verrastro. Email correspondence. (September 2008).

¹⁷ Senator Barack Obama specifically referred to independence from international oil in his acceptance speech as the Democratic nominee for President: “And for the sake of our economy, our security, and the future of our planet, I will set a clear goal as President: in ten years, we will finally end our dependence on oil from the Middle East.” See: Barack Obama. *Remarks of Senator Barack Obama: The American Promise (Democratic Convention)*. (Denver, CO: 28 August 2008), http://www.barackobama.com/2008/08/28/remarks_of_senator_barack_obam_108.php. That has also been the message from President George W. Bush, see his 31 January 2006 State of the Union Address. However, of note, Senator John McCain’s energy policy specifically states that “while our dependence on foreign oil does support our enemies, the United States relies on Canada and Mexico – our democratic friends and NAFTA partners – for much of our oil.” See: John McCain. *McCain on Energy for A Secure Nation*. (23 June 2008), <http://www.johnmccain.com/Informing/News/PressReleases/f1a7b94c-5df9-4635-9b06-5618454bb82d.htm>.

¹⁸ In a 21 May 2008 US Senate hearing, Illinois Senator Richard (Dick) Durbin berated oil executives for their intention to solve the supply challenge by investing in the oil sands. According to the Senator: “Because of high prices of oil many companies are looking at many sources they have never considered before, and one of these is Canadian tar sands. You would readily concede this is one of the dirtiest sources of oil that we could be refining, and has environmental concerns which we should all share. When you talk to us about drilling in every direction, in every place and expanding refining capacity for some of the dirtiest crude sources in the world, excuse me, but we also have an environmental and public health responsibility that we have to take into consideration. This should not come down to an equation of your money or your life.” See: “Past Podcasts: The House.” CBC Radio. (24 May 2008), <http://www.cbc.ca/podcasting/pastpodcasts.html?13#ref13>.

¹⁹ Rawi Abdelal and Adam Segal. “Has Globalization Passed Its Peak?” in *Foreign Affairs*. 86, no. 1 (January/February 2007): 103-114. Also see: Eric Helleiner. “The Return of Regulation, and what a difference a decade makes,” in *Globe and Mail*. (Friday 18 September 2008).

Medvedev in a murky power sharing arrangement, came as a response to Georgia's President Mikheil Saakashvili's attack of the breakaway region of South Ossetia. In less than a week, Russia took control of South Ossetia and Abkhazia, and, before September, formally recognized the two provinces' status as independent states. Russia was on the move to re-establish its former sphere of influence.

Much as they had done in reaction to the 1968 Soviet takeover of Czechoslovakia, the US and their western counterparts were full of condemnation, but took no action. Unlike the 1960s, however, Russia now has the upper hand. The events in Georgia meant that with one deftly executed play, Russia asserted its control over one of only two oil and gas transport corridors outside its territory which connect the oil-rich Caspian region to Europe and the West.²⁰ Given that Europe imports 82 percent of the oil and 57 percent of the natural gas that it consumes, and that half of the gas and 30 percent of the oil come from Russia,²¹ any more dependence on Russian oil can only serve to weaken its hand.

In contrast, Vladimir Putin has steadily strengthened Russia's position since he came to power. Every move, from the systematic takeover of oil and gas assets, to the renegotiations of oil and gas contracts with the former Soviet states, to the methodical purchase of gas distribution assets in consumer countries and the attempts to control all transportation corridors, leads to the conclusion that Russia is executing a grand strategy. As Dawid Halbersztadt, a Polish citizen and long-time Russia observer commented, "the thrust to regain the imperial power is back, and now energy is the weapon."²²

From this perspective, the move on Georgia was a calculated risk. Although the negative consequences – particularly the loss of investors' confidence – were significant, asserting control over the Caspian and Central Asian westward-moving oil and gas pipelines and rich gas resources, both for resale and for Russia's own consumption, is crucial to Putin's plan.²³

It is a complex situation. While Russia holds the world's largest gas reserves and is the globe's largest producer and exporter of the product, its producing fields are showing steep decline. Much investment is needed to reverse this situation and explore new fields. Gazprom, the government-controlled giant responsible for 25 percent of the country's total tax revenue, currently produces 85 percent of Russia's gas. The company is heavily regulated and obliged to supply the massive domestic market at set prices, regardless of profitability. For instance, prices at home are at most 20 percent of what Germany pays for the same product. In 2006, this translated into a US\$420 million loss on domestic gas sales.²⁴ This math is not lost on Gazprom: if Russia could control all transit routes to the West, it could potentially secure lower-cost gas from Central Asia to supply domestic markets, freeing its own to export at substantial profits, producing extra funds for the much-needed investments.

But then, China rises...

This strategy would be much easier to implement if Russia were the only regional power eyeing those reserves. Unfortunately for the Kremlin, China is not standing still. In July 2008, the China National Petroleum Corporation (CNPC) announced the start of construction for the China-Central Asia gas pipeline, China's first cross-border gas pipeline. According to a *ChinaStakes* report:

CNPC expects the pipeline to be completed and put into operation in 2009, and a second in 2010. After the whole project is completed, it will move about 30 billion cubic meters of natural gas from Central Asia to

²⁰ Russia, Kazakhstan, Azerbaijan, Iran and Turkmenistan all border the landlocked Caspian Sea.

²¹ Ariel Cohen. "Europe's Strategic Dependence on Russia's Energy." Backgrounder #2083. The Heritage Foundation, (November 2007), <http://www.heritage.org/Research/Europe/bg2083.cfm>.

²² Personal conversation. (August 2007).

²³ Shamil Yenikeeff. "The Georgia-Russia standoff and the future of Caspian and Central Asian energy supplies." Oxford Energy Comment. Oxford Institute for Energy Studies. (Oxford: August 2008). In Central Asia, it is especially Kazakhstan, Turkmenistan and Uzbekistan.

²⁴ "Country Analysis Briefs: Russia." Energy Information Administration. (May 2008), <http://www.eia.doe.gov/cabs/Russia/pdf.pdf>.

China every year of its expected 30-year operation period. That amounts to about 50 percent of China's total 2007 natural gas production.²⁵

CNPC is developing both source gas and pipelines in cooperation with Turkmenistan, Kazakhstan and Uzbekistan's local oil and gas companies. In addition, China has successfully secured an oil deal with Kazakhstan for provision of approximately 200,000 barrels a day to be transported in the Atyrau-Alashankou pipeline, scheduled for completion by 2011.²⁶

Much like the US, China is intent on securing overseas oil and gas assets to ensure security of supply, a strategy needed to offset its own energy shortfall. Although domestic oil production has been increasing steadily, from 2.1 mmb/d in 1980, to 2.7 mmb/d in 1990, to 3.2 mm/d in 2000, to 3.7 mm/d in 2007, consumption has increased at a much faster pace. The numbers are telling. Demand of 1.6 mmb/d in 1980, increased to 2.3 mmb/d in 1990, then almost doubled to 4.4 mmb/d in 2000, and almost double again in seven years, to 7.8 mmb/d in 2007. A net importer since 1993, China now imports almost half of its needs.²⁷

Unlike the US, however, the Chinese government has full control of the country's three oil companies: CNPC, the China Petroleum and Chemical Corporation (Sinopec) and the China National Offshore Oil Corporation (CNOOC).²⁸ Through these companies, it scours the world in search of opportunities. In the last few years China has become a major player in Sudan, Indonesia, the Niger Delta and Angola, as well as participating in the sector in Russia, Iran, Kazakhstan, Ecuador, Syria and even here in Canada. Its *modus operandi* is unique. For instance, its entry into Angola, which in the last two years has become China's largest crude supplier, surpassing Saudi Arabia, was accompanied by substantial tied-aid low interest loans and outright investments estimated to exceed US\$13 billion.²⁹ These investments include everything from infrastructure to oil and gas services, to telecom, health care³⁰ and even military equipment.³¹ Those investments stand in contrast to the Western world's previous refusal to help Angola rebuild its economy unless it subscribed to its tough 'small government, curb spending, and maintain transparency' philosophy.³²

Russia and China's differing strategies are exemplified by their individual approaches to Central Asia. While China focuses on securing resources and, according to Xia Yishan of China's International Studies Institute, "prefers a world in which major powers don't touch each other's red lines,"³³ Russia views resources as a tool to help reinstate its superpower status.

Still, Russia and China are not alone...

Despite the international focus on Iraq, its neighbour, Iran, is the other major player in energy, particularly because of its strategic geographic position. Iran is the only country, other than Georgia, that can offer an alternative transit route from the Caspian and Central Asian regions to the West, via the Persian Gulf. Iran is a well known energy powerhouse in its own right: it ranks third in global proven conventional oil and natural gas reserves and

²⁵ "Central Asia Pipeline to Secure Gas for China" in *Chinastakes.com*. (2 July 2008), <http://www.chinastakes.com/story.aspx?id=480>.

²⁶ Shamil Yenikeeff. "The Georgia-Russia standoff and the future of Caspian and Central Asian energy supplies."

²⁷ Calculated from BP "Historical Statistics 2008 edition." <http://www.bp.com/productlanding.do?categoryId=6929&contentId=7044622>.

²⁸ "Country Analysis Briefs: China." Energy Information Administration. (August 2006), <http://www.eia.doe.gov/emeu/cabs/China/Full.html>.

²⁹ Stephanie Nolen. "Angola Chooses Homegrown Economic Remedy," in *Globe and Mail*. (Friday 19 September 19 2008).

³⁰ Lucy Corkin. *China's Interest and Activity in Angola's Construction and Infrastructure Sectors*. (Stellenbosch, South Africa: Centre for Chinese Studies at Stellenbosch University). Accessed 2 August 2006, <http://www.focusweb.org/images/stories/china/angola%20report%2031%20august%202006.pdf>.

³¹ David H. Shinn. "China in Africa: Military and Security Relations." Lecture presented at the Kennedy School of Government. (Cambridge, MA: 1 June 2007) in Annette Hester. "Canada as the ?Emerging Energy Superpower?: Testing the Case." Canadian Defense and Foreign Affairs Institute. (October 2007).

³² Stephanie Nolen. "Angola Chooses Homegrown Economic Remedy," in *Globe and Mail*, (Friday 19 September 2008).

³³ Jayshree Bajoria. "Russia's Security Ties in Asia." Daily Analysis. Council on Foreign Relations. (28 August 2008).

is the world's fourth largest exporter of crude oil after Saudi Arabia, Russia and Norway. Nonetheless, although its gas reserves are second only to Russia's, most of them have not been developed, and the country often needs to import from its neighbours.

Similar to Russia, Iran is positioning itself. According to the US Energy Information Agency, the country recently expanded the pipeline that goes from the port of Neka on the Caspian coast to its many refineries. In addition, it expanded its oil import capacity at the Caspian port to handle increased shipments from Russia and Azerbaijan, and to enable crude oil swaps with Turkmenistan and Kazakhstan.³⁴ Given the acrimonious history between Iran and the West, the country's mercurial leadership, religious bent and intense aversion to all things "Western," it is impossible to imagine either Europe or the US treating this transit route as a realistic alternative for securing energy supplies.

Russia, China and Iran are major forces on the global energy scene. But there are other important players: Japan and India on the demand side, with the Middle Eastern countries providing this supply. From this complex scenario, however, there is a simple reality facing the US today: energy markets are heavily contested and all about politics, and the American ability to impose its might to gain unfettered access to global supplies is severely compromised.

STEP II: THE US STRATEGY FROM WAY BEFORE JIMMY CARTER...

A desire to control oil supplies dates back to the time when oil first became a prized commodity. The overt move to obtain supplies outside national borders, however, came with the conversion of naval ships from coal to oil. Britain was the first to leap, a gutsy move for a country that had plentiful supplies of coal and virtually no oil. This did not faze Winston Churchill, then First Lord of the Admiralty of the British Government. His solution, voiced in 1912: "We must become the owners or at any rate the controllers at the source of at least a proportion of the oil which we require."³⁵ Consistent with his thinking, in 1913 he orchestrated a partial nationalization of the Anglo-Persian Oil Company (APOC). From then on, securing supplies at any cost was a major aspect of the British foreign affairs strategy.

The Americans were not far behind. Although they were not dependant on Middle Eastern oil immediately post-World War Two, they believed that control of Middle Eastern supplies, by either themselves or their allies, was essential.

Meanwhile in Iran, growing local discontent over the royalties and exploration terms imposed by the British led to the democratic rise of Prime Minister Mohammed Mossadeq and to the 1952 nationalization of the Anglo-Iranian Oil Company (AIOC).³⁶ Although the British government tried to secure President Truman's support in overthrowing Mossadeq, US collaboration only came over a year later, when the new American President, Dwight Eisenhower, authorized the Central Intelligence Agency (CIA) to finance the operation. In August 1953, Shah Mohammed Reza Pahlavi was restored to power and an oil agreement was reached with a new international consortium, in which AIOC and American oil companies each had a 40 percent interest.³⁷

³⁴ In the case of crude swaps, the oil from the Caspian is consumed domestically in Iran and an equivalent amount of oil is produced for export through the Persian Gulf with a Swiss-trading arm of National Iranian Oil Company for a swap fee. See: "Country Analysis Briefs: Iran." Energy Information Administration. (October 2007), <http://www.eia.doe.gov/cabs/Iran/pdf.pdf>.

³⁵ Winston Churchill, qtd. in William Engdahl. "Oil and the origins of 'War to Make the World safe for Democracy.'" (22 June 2007). Accessed 18 September 2008, http://www.engdahl.oilgeopolitics.net/History/Oil_and_the_Origins_of_World_WW/oil_and_the_origins_of_world_w.HTM#_edn14.

³⁶ APOC was renamed Anglo-Iranian Oil Company (AIOC) in 1935 and eventually became the British Petroleum Company (BP) in 1954, as one root of the BP Company today.

³⁷ Peter G. Boyle. *The Churchill-Eisenhower Correspondence, 1953-1955*. edited by Peter G. Boyle. (Chapel Hill, NC: UNC Press, 1990): 52.

This event was indicative of the “behind the scenes” approach preferred by most American presidents. While espousing the virtues of democracy and private enterprise (a proxy for markets) when it came to oil, particularly oil from the Middle East’s vast reserves, American leaders deemed the use of military force and coercion perfectly acceptable. Even Eisenhower, who was reluctant to allow the US to develop a reliance on the Middle Eastern supplies, privately maintained that “should a crisis arise threatening to cut the western world off from the Mid East oil, we would *have* to use force.”³⁸

US involvement in the Middle East continued past Eisenhower’s presidency. Kennedy deepened relations with Saudi Arabia. Nixon, who had to concentrate his efforts on the Vietnam War, supported the Shah of Iran with substantial financial backing and access to military equipment in exchange for his defense of Western interests in the region. Nixon’s strategy proved both ineffective and treacherous. In 1973, in response to the Western world’s support of Israel, Arab OPEC members implemented an oil embargo that prompted prices to quadruple in the short span of six months.³⁹

When Jimmy Carter came to power in 1977, the global energy markets were still dealing with the consequences of the oil embargo. The US was in a precarious position. Although President Ford had promised a decrease in foreign oil dependency, imports increased by one million barrels between 1974 and 1976, accounting for 35 percent of American consumption. As soon as he took office, Carter proposed a comprehensive energy bill. Unfortunately, he was unable to muster the support needed for its approval. By the end of 1977, US oil imports had jumped to 48 percent of total consumption. It took the President another full year to get Congress to enact a much watered-down Energy Bill.⁴⁰

Any sense of accomplishment was short-lived. In January 1979, after months of protests in the streets of Tehran and continuous strikes by oil workers, the Shah of Iran abandoned the country. A month later Ayatollah Khomeini triumphantly returned from exile. The string of miscalculations made by successive US administrations finally caught up with them.

From then on, the situation deteriorated rapidly. The US faced severe oil shortfalls resulting in long lineups at the pumps. Alternative fuels and energy incentive programs were created, and yet more promises of eliminating dependency on foreign oil were made. These measures, however, would take time to produce results. And time was one luxury the US did not have. The crisis in Iran culminated on November 4th, when militants stormed the US Embassy in Tehran and took approximately 70 Americans captive. Not even a month later, Russia invaded Afghanistan.

In response, President Carter was defiant in his 23 January 1980 State of the Union Address. For the first time in US history, a president made a clear statement asserting his country’s right to use military force in defense of access to oil supplies. In his words:

The Soviet Union must realize that its decision to use military force in Afghanistan will be costly to every political and economic relationship it values. [...] The region which is now threatened by Soviet troops in Afghanistan is of great strategic importance: It contains more than two-thirds of the world’s exportable oil. The Soviet effort to dominate Afghanistan has brought Soviet military forces to within 300 miles of the Indian Ocean and close to the Straits of Hormuz, a waterway through which most of the world’s oil must flow. The Soviet Union is now attempting to consolidate a strategic position, therefore, that poses a grave threat to the free movement of Middle East oil. [...] Let our position be absolutely clear: An attempt by any outside

³⁸ qtd. Dwight Eisenhower in Jay Hakes. *A Declaration of Energy Independence*. (Hoboken, NJ: John Wiley & Sons, Inc., 2008): 90. Italics original to text.

³⁹ Annette Hester. “Canada as the ?Emerging Energy Superpower’: Testing the Case.”

⁴⁰ Jay Hakes. *A Declaration of Energy Independence*. 44.

force to gain control of the Persian Gulf region will be regarded as an assault on the vital interests of the United States of America, and such an assault will be repelled by any means necessary, including military force.⁴¹

This concept became known as the "Carter Doctrine."

The crisis intensified with Iraq's invasion of Iran in September 1980. Oil prices shot up once again, from US\$14 in 1978 to US\$35 in 1981.⁴² Although the world faced another oil crisis, wisely, foreign powers did not intervene directly. Nonetheless, the US sent seven surface ships to the Persian Gulf, Kuwait reflagged 11 of its oil tankers to a dummy US corporation to qualify for US military protection and the US ensured that Iran did not gain control of the Strait of Hormuz.⁴³

It took years for the global economy to recover from the oil shocks. The start of Ronald Reagan presidency in 1980 marked the beginning of the era where "free markets" were thought to trump "politics."⁴⁴ An examination of the policies of that era is crucial to the understanding of Canadian energy policy and will be offered later in this work. For now, it suffices to note that, with the signing of the CUSFTA, Reagan secured future stable access to Canada's energy resources. Nonetheless, energy was only one of CUSFTA's chapters. In terms of US international oil strategy after President Carter, there are three defining moments.

The first began with the 1991 US liberation of Kuwait. Although official statements did not link these efforts to the defense of control over oil supplies, secret documents declassified in 1997 make clear the administration's intent. The directive authorizing the war began:

Access to Persian Gulf oil and the security of key friendly states in the area are vital to US national security [...] the United States remains committed to defending its vital interests in the region, if necessary through the use of military force, against any power with interests inimical to our own.⁴⁵

Curiously, it seems that the US was suddenly ready to believe that the Soviet Union was now on its side. James A. Baker III, then Secretary of State, recounts that when the Iraqi troops crossed the Kuwait borders on 2 August 1990, he was meeting with Soviet Foreign Minister, Eduard A. Shevardnadze, in Siberia. The next day, the two issued a joint statement condemning Iraq, without the approval of Soviet President Mikhail Gorbachev, because "he [Shevardnadze] felt it was simply the right thing to do."⁴⁶

The demise of the Soviet Union opened the door to the second moment: Clinton's determination to decrease dependency on Middle East oil by increasing control over the Caspian Sea resources. Intriguingly, this development is linked to the same Eduard A. Shevardnadze, then in his new incarnation as the President of the newly independent Republic of Georgia.⁴⁷ In July 1997, he visited Washington to deliver a message: "Georgia needs American investments, and more important, it is in the strategic interests of the United States to build the strongest possible economic, cultural and political ties to Georgia"⁴⁸ James Baker III, who had previously withdrawn from public

⁴¹ Jimmy Carter. "State of the Union Address 1980." The Jimmy Carter Library. (23 January 1980). Accessed 17 September 2008, <http://www.jimmycarterlibrary.org/documents/speeches/su80jec.phtml>.

⁴² "BP Statistical Review of World Energy 2008." http://www.bp.com/liveassets/bp_internet/globalbp/globalbp_uk_english/reports_and_publications/statistical_energy_review_2008/STAGING/local_assets/downloads/spreadsheets/statistical_review_full_report_workbook_2008.xls.

⁴³ Jay Hakes. *A Declaration of Energy Independence*. 79.

⁴⁴ The events in the US followed the 1979 rise to power of Reagan's British counterpart the "Iron Lady," Margaret Thatcher.

⁴⁵ qtd. "National Security Directive 54." in Jay Hakes. *A Declaration of Energy Independence*. 94.

⁴⁶ James A. Baker III. "America's Vital Interest in the "New Silk Road,"" in *New York Times*. (21 July 1997). Accessed 17 September 2008, <http://query.nytimes.com/gst/fullpage.html?res=9803E6DD143AF932A15754C0A961958260>.

⁴⁷ The newly independent Republic of Georgia's first president only lasted a month in power before Shevardnadze was appointed acting chairman of the Georgian state council in March 1992. When the Presidency was restored in November 1995, Shevardnadze won the election by a wide margin.

⁴⁸ James A. Baker III. "America's Vital Interest in the "New Silk Road,"" in *New York Times*. (21 July 1997). Accessed 17 September 2008, <http://query.nytimes.com/gst/fullpage.html?res=9803E6DD143AF932A15754C0A961958260>.

life, helped Shevardnadze sell his message. Baker wrote a compelling piece in the *New York Times* in which he backed Shevardnadze's call for building strong ties with Georgia partly because of its potential importance as a shipping outlet for oil and gas.⁴⁹

Their efforts paid off. Two years later, in November 1999, in a ceremony in Istanbul, the leaders of Georgia, Azerbaijan, Kazakhstan and Turkey signed an accord with President Clinton which agreed to support the building of a pipeline to carry Caspian oil to ports in the West on a route that did not pass through Russia or Iran. US Secretary of Energy Bill Richardson heralded the agreement as "a major foreign policy victory [... one that] advances America's national interest."⁵⁰ The pipeline, linking Baku-Tbilisi-Ceyhan, was built by an energy consortium led by BP and began operations in 2005.⁵¹

Finally, the last defining move was President George W. Bush's war on Iraq. Although there are many complexities to the current political relationships between the US and various Middle Eastern countries, and despite the White House's insistence that their motives were strictly linked to eliminating Iraq's threat to their national security, as it had weapons of mass destruction and harbored and trained Al Qaeda operatives, one can question the full innocence of their motives. The truth will take years to unravel, and will certainly have to wait until all documents are declassified. However, given the rich history of US military intervention in the Middle East, there is little reason to believe that this war was about something other than ensuring access to their abundant energy resources.

STEP III: TRANSLATING STRATEGY AND HISTORY INTO THE PRESENT

Regardless of motives for its actions in the Middle East, the US and most of its western allies now have very limited options.

While it is a fact that over half of the world's conventional (read, low cost) reserves remain in the Middle East, after half a century of deliberate attempts to secure unrestricted access to those and the Caspian Sea energy resources, and after billions of dollars of military and infrastructure spending to ensure the free flow of oil from the region, the US is no closer to controlling access to Middle Eastern oil than it was when it started to contemplate this proposition. In fact, it could be argued that after the disastrous tenure of President Bush, success is more elusive than ever.

Russia just proved that it still controls its backyard, the Caspian Sea; China will continue to gain space in Central Asia; Iran plays by its own rules; western control of Iraq's resources is not likely to last long after the US withdraws, which it will have to eventually, and a secure transportation corridor through Afghanistan and Pakistan is a pipedream.

Nevertheless, the situation might not be as dire as the US hawks paint. Members of the defence community – including military, analysts and security consultants – have made their careers convincing the US government, energy experts and the public that total control over the Strait of Hormuz is essential for the country's energy security. Their rationale is that one-fifth of the world's production must transit through that narrow corridor,⁵²

⁴⁹ James A. Baker III. "America's Vital Interest in the "New Silk Road,"" Note that Baker failed to disclose that his law firm represented an oil consortium and other companies in the region, forcing the *New York Times* to issue an Editor's Note that is, to this date, attached to the op-ed.

⁵⁰ Stephen Kinzer. "Summit in Turkey: The Caspian Accord: Caspian Lands Back a Pipeline Pushed by West," in *New York Times*. (19 November 1999).

⁵¹ "More than a decade in the making, the Baku-Tbilisi-Ceyhan oil and South Caucasus gas pipelines are now a reality." BP. <http://www.bp.com/sectiongenericarticle.do?categoryId=9013062&contentId=7025624>.

⁵² "Persian Gulf Region: Backgrounder." Energy Information Administration. (Washington D.C.: June 2007), http://www.eia.doe.gov/emeu/cabs/Persian_Gulf/Background.html.

and even if the US is not a direct recipient of that oil, any disruptions would send prices through the roof. Clearly, that would have a direct impact on the US economy. While this logic made sense when the US was virtually the only major global oil consumer, now it does not. The rise of China, and before long, India, as major consumers and importers, will help even the balance between importers and exporters, removing most of the incentives to disrupt the flow of oil. Currently, half of Saudi Arabia's production goes to Japan, South Korea, China and India. In fact, China's imports from that country are contracted to increase by 38 percent in 2008, rising to approximately 790,000 b/d, and could reach 1 million b/d by 2010.⁵³ Moreover, much of China's imports come from Saudi Arabia, Iran and Oman. In light of the current global financial situation, which is unfolding as China holds almost US\$2 trillion in reserves⁵⁴ and Japan holds further financial surpluses, and given the fact that their dependence on the Middle East is far greater than that of the US, it stands to reason that the US will have to reevaluate its continued weighty military involvement in the region. It is reasonable to speculate that eventually, on the basis of finances alone, the US will be forced to scale down its presence in the Persian Gulf, difficult though that might be. Undoubtedly, other countries would step up to the plate.

If the US leadership is able to accept this new reality, adjust its policies and implement the series of measures necessary to diversify its energy sources, then, over time, supplies from the Western Hemisphere stand to make up the balance. In this hemisphere, the situation and the players are much different from those of the East. Here there is no room for applications of the Carter Doctrine.

About the Americas

Today, Canada, Mexico and Venezuela, and to a much lesser extent, Ecuador, Colombia and Brazil, provide 54 percent of the US oil and products' imports. Since 1999, Canada has been the country's top petroleum supplier. And from 2004 on, the second, third and fourth top suppliers have been Mexico, Saudi Arabia and Venezuela.⁵⁵ Still, among the major suppliers from the hemisphere, Canada is the only country able to increase production and exports. Brazil is the only other producer that shows potential to become a significant exporter, while Mexico and Venezuela's crude exports to the US are diminishing as a result of declining production, coupled with political challenges.

In Venezuela's case, it is no secret that President Chavez would like nothing better than to stop selling oil to the US. However, the country's heavy crude production requires special refining capacity, which is at a premium globally. Some of this capacity is in the hands of *Petróleos de Venezuela S.A. (PdVSA)*, Venezuela's oil multinational, and is located in the US. Consequently, in spite of President Chavez's rhetoric, his ability to maneuver is limited. Nonetheless, as refining capacity expands elsewhere, it is safe to assume that he will look for alternative markets. Another issue of concern is the lack of transparency regarding Venezuela's current production and its discipline, or lack thereof, in realizing the investments needed to increase production. And then, in a move that screams "politics," Venezuela has invited Russia to conduct navy exercises off its coast, in the Caribbean Sea. This is certain to make its neighbours in the Americas very nervous. Nevertheless, the current fall in oil prices will have a substantial impact on President Chavez's ability to continue using petro-dollars to conduct foreign policy. It is likely that domestic pressure will force him to turn his attention to the serious investments needed at home – both in general infrastructure and in the energy sector.

Mexico's situation is dire. Although the country is a significant oil producer, Pemex, the state oil company, is treated as the government's cash cow as over 55 percent of revenues go directly to the federal budget, which leaves it unable to invest in exploration and development. As a result, the country has less than ten years of oil

⁵³ "Saudi Arabia: Oil Exports and Shipping." Energy Information Administration. (Washington D.C.: August 2008), http://www.eia.doe.gov/emeu/cabs/Saudi_Arabia/OilExports.html.

⁵⁴ Associated Press. "China foreign exchange reserves at \$1.905 trillion," in *International Herald Tribune*. (14 October 2008), <http://www.ihf.com/articles/ap/2008/10/14/business/AS-China-Foreign-Reserves.php>.

⁵⁵ "Table 5.4. Petroleum Imports by Country of Origin, 1960-2007." Energy Information Administration. (Washington D.C.), <http://www.eia.doe.gov/aer/txt/ptb0504.html>.

reserves left, and struggles to be self-sufficient in gas as production from its mammoth Cantarell field, one of the world's largest, declines: it fell from 2 million b/d in 2005 to 1.5 in 2007, with further expectations for decline. So far, Mexican politicians, who have the power to approve either the constitutional or fiscal reforms needed to reverse this trend, have been unable to tackle the constitutional challenge. On the positive side, they reached a compromise on the fiscal reform in 2007 and, in 2008, on a package of seven bills to reform the oil sector. Although the fiscal reform means Pemex will have an extra US\$3 billion/year to invest, and the recent approval of the reforms are a victory for President Calderon, who invested much political capital on their approval, it is unlikely that the changes are substantial enough to halt production declines and provide the necessary incentives for investment in new exploration and production.⁵⁶ Add to these challenges the precipitous drop in oil prices, and the outlook for Mexico's energy sector is worrisome.

Brazil provides a bright spot in the region. Its well-diversified energy matrix gives it room to maneuver. Thanks to Petrobras⁵⁷ leadership in developing deep water exploration technology, the country is self-sufficient in oil and became a net exporter (albeit modest) in 2007.⁵⁸ More promising, and certainly the game-changer, is the fact that Brazil has just announced the discovery of a new oil play, the *pre-salt*, which is likely to add billions to the country's reserves and potentially turn Brazil into one of the world's largest hydrocarbon producers. Although neither Petrobras nor others who hold *pre-salt* concessions have officially announced reserves estimates, speaking to reporters on 7 November 2008, Haroldo Lima, head of the Brazilian Petroleum Agency, the country's hydrocarbon regulator, affirmed that "prognosis indicates at least 50 billion barrels of oil equivalent and a maximum of 70, 80 billion barrels," clarifying that this would include only licensed blocks.⁵⁹ Add to these estimates the rest of the basin and it is not farfetched to imagine that potentially 100 billion barrels could be added to Brazil's reserves.⁶⁰ Even before these new discoveries, Brazil was on track to more than double its current production to 4.3 million barrels a day by 2023. Nonetheless, its current self-sufficiency in oil is only possible because of the country's extensive use of sugar-cane-based ethanol, which accounts for 40 percent of all transportation fuels consumed in the country.

While this paper's focus does not permit a full discussion of Brazil's biofuels program, it is important to note that the country is considered a world leader in the production of sustainable biofuels and in the technology that allows vehicles to use any combination of gasoline and ethanol at the pump (flex fuel). Combine all these factors and it is only a matter of time before Brazil becomes a global force in the energy field. Granted, there are many challenges ahead. The level of investment needed to fully develop the *pre-salt* potential is massive, as are the technological advancements required, including new ways to deal with carbon emissions. Add to this list the labour, infrastructure and logistical demands and its situation is remarkably similar to Canada's.

Among the Western Hemisphere producers, Canada stands out as the most important and reliable current and future supplier to the US. As Prime Minister Stephen Harper points out, Canada is a net exporter of oil and gas, as well as being a leading producer of electricity and uranium. After proving that its mammoth bitumen reserves were economical, its proven reserves shot up to 178.8 billion barrels, second only to Saudi Arabian reserves. Canadian production went from 2.09 million barrels per day (mmb/d) in 1997 to 2.74 mmb/d in 2007. Exports to the US went from 1.2 mmb/d to 1.8 mmb/d, while imports grew from 760,000 b/d to 863,000 b/d during the

⁵⁶ "Mexico Senate approves weak oil reform." *Oxford Analytica*. (27 October 2008).

⁵⁷ Petrobras is a mixed capital company with stock traded in the New York and São Paulo stock exchanges. The government of Brazil maintains a controlling interest.

⁵⁸ "Country Analysis Briefs: Brazil." Energy Information Administration. (Washington D.C.: October 2008), <http://www.eia.doe.gov/emeu/cabs/Brazil/Full.html>.

⁵⁹ "World's 5th Brazil's pre-salt oil might top 100 billion barrels." (Mecropress, 8 November 2008). Accessed 12 November 2008, <http://www.brazzilmag.com/content/view/10160/>.

⁶⁰ By comparison, according to the BP Annual Statistics, Kuwait's reserves are 96.5 billion barrels; United Arab Emirates, 97.8 billion; Venezuela, 76.9 billion and Russia, 48.6 billion. Only Iraq (112 billion barrels), Iran (89.7 billion), Canada (178 billion) and Saudi Arabia (261.7 billion) have larger known reserves of oil.

same period.⁶¹ Newfoundland currently produces 16 percent of Canada's oil and is set to increase production once the Hebron field is fully operational. And climate change is unlocking the Arctic's huge potential reserves.

The picture on the natural gas side is not as rosy. While Canada has managed to maintain both its production and exports to the US constant over the last few years, reserves have declined 16 percent over the last decade.⁶² There is hope that new technologies and exploration of unconventional gas will bring a surge in production. However, even then, with expected increase in demand in Canada and the US, the urgency of having the infrastructure to deliver northern gas and imported liquid natural gas will intensify.

Lastly, on the Arctic front, the federal government has been moving all the right pieces to enable the country to be on equal footing with the US and Russia. But there is much more to this story. If Canada is to realize its potential and help the US shore up a strong Western Hemisphere, capable of delivering all forms of energy in a sustainable manner and in a constructive and collaborative environment, it will need to tease out the many lessons its rich energy history offers, and act on them.

STEP IV: THE CANADIAN STORY

While to the outside observer, Canada's current resource wealth might appear to have materialized effortlessly, Canadian energy history, particularly that of the oil and gas sectors, will show it was hard earned and marked by many challenges. There were the shortages of supply during both World Wars – solved thanks to the generosity of American neighbours who shared their scarce resources. In 1956, there were the efforts of then Minister of Trade and Commerce, C.D. Howe, to ensure infrastructure was in place to guarantee access to domestic energy supplies, leading to the building of a pipeline entirely on Canadian territory to transport gas from Alberta to Ontario.⁶³ And a few years later Canada secured an exemption from US import quotas thanks to a compromise reached by Prime Minister Diefenbaker and US President Eisenhower in 1959, who reconciled the interests of US oil multinationals and Canadian independent producers by agreeing to an arrangement that stands to this day, where supplies from Western Canada would be delivered to the US markets, while imported oil would supply Eastern Canada.⁶⁴

However, no other period in Canadian energy history compares to the tenure of Pierre Elliot Trudeau, who was Prime Minister from 1968 to 1979 and again from 1980 to 1984, and that of his Alberta counterpart, Peter Lougheed, who came to power in 1971. Their imprints are so deep that forty years later they still affect the political landscape of this country.

Prime Minister Trudeau's vision of Canada was one of a self-sufficient nation, owner of its oil industry, and of the federal government and consumers receiving the direct benefits of the bonanza of the high oil prices of the 1970s. Peter Lougheed, who was elected in the wake of 36 years of uninterrupted rule by the Social Credit party, had as strong a vision, but of a different landscape. Premier Lougheed saw a dynamic Alberta, where the oil sands were an economically viable resource and where the province acted as the resource owner that it was.

⁶¹ National Energy Board – compiled by the author from various reports. Further information available at: <http://www.neb.gc.ca/clf-nsi/rnrgynfmrn/sttstc/sttstc-eng.html>.

⁶² Over that last five years, Canada has produced approximately 16.9 billion cubic feet/d (bcf/d) of natural gas while exported approximately 10 bcf/d. Production and exports data from CAPP and reserves data. See: Sidney Weintraub and Annette Hester. "Canada" in *Energy Cooperation in the Western Hemisphere*, edited by Sidney Weintraub et al. (Washington, D.C.: CSIS, 2007): 78.

⁶³ The debate surrounding the financing of the Trans-Canada pipeline, particularly the issue of government funding going to American investors, which were part of the syndicate of financiers, and the fact that the government invoked closure before the debate even started in order to meet the construction deadline for that year, was one of the most contentious in Canadian parliamentary history and a decisive factor in the 1957 defeat of Louis St. Laurent's Liberal government. See Robert Bothwell. "Pipeline Debate," in *The Canadian Encyclopedia Historica*. Accessed 2 August 2007, <http://www.thecanadianencyclopedia.com/PrinterFriendly.cfm?Params=A1ARTA0006305>.

⁶⁴ Tammy Nemeth. "Canada-U.S. oil and gas relations, 1958 to 1974." Doctoral degree thesis. (University of British Columbia, 2007).

In order to appreciate the events that followed, and the relationships that continue to this day, it is important to understand the areas of jurisdiction of the federal and provincial governments in the context of oil and gas production. Natural resources fall under the purview of the provinces as opposed to the federal government. In practice, this jurisdictional arrangement translates into the provinces designing the fiscal and royalty regimes, as well as regulating all aspects of sector development and transportation within their boundaries, while the federal government retains taxation powers as well as the inter-provincial transportation regulatory domain and all aspects of international sector affairs – which include the right to regulate imports and exports.

Each leader realized their respective vision differently. Prime Minister Trudeau created a national oil company, Petro-Canada, and was instrumental in building a pipeline linking Sarnia to Montreal, thus enabling oil from the west to reach Quebec. Trudeau also established a series of policies designed to wrest control of the oil industry from provincial hands. The culmination of these efforts was the enactment of the NEP in 1980. The measures were many and included price controls, special incentives for exploration in federal lands, differentiated prices for domestic and export markets, export restriction and taxation and an increase of Canadian ownership and participation in the oil and gas industry.⁶⁵

Peter Lougheed was also not afraid to intervene directly in the industry. While he fiercely sided with the private sector in his defense of provincial jurisdiction against the intrusion of the federal government, he was no buddy of the big oil companies. Early into his tenure, to their chagrin and without consultation, he raised royalty rates. He invested directly in commercial ventures, such as Syncrude, in exchange for a hefty equity position, and created the Alberta Energy Company. He established new research authorities, including AOSTRA – inside a public-private partnership ensured that it was the province who retained the intellectual property rights to any scientific discovery or process generated with its funds. And he created the Heritage Fund, a new “savings” fund which would be a legacy for future generations.⁶⁶

The acrimony produced by these two conflicting visions was just as unprecedented as these leaders’ actions. And it all unraveled when oil prices started to decline sharply, from their all time high in 1980 of US\$36.83 (US\$93.08 in 2007 dollars), and a period of global slowdown set in.⁶⁷

Dismantling whatever was left of the NEP, reaching a new agreement with the provinces, and re-engaging the US in a much friendlier tone became the first and foremost task of Prime Minister Brian Mulroney in 1984. He did this through the Western and Atlantic Accords and through a statement on frontier policy. It took a few years, but in 1989 he signed the CUSFTA where energy was dealt with in a number of clauses, including prohibitions of the enactment of price controls on oil and natural gas and of differentiated pricing systems. In terms of exports, CUSFTA also contains the previously mentioned proportionality rule, which, according to David Pumphrey, who was part of the US negotiating team, follows the same construct as it was previously agreed by many countries in the International Energy Agency sharing system.⁶⁸ In CUSFTA, exceptions based on national security are restricted to armed conflicts.⁶⁹

Prime Minister Mulroney was just in step with times. On the energy issue, one of the first announcements made by Ronald Reagan when he became president in 1980 was the immediate removal of price controls on oil and

⁶⁵ Tammy Nemeth ctd. in Anne Hester. “Canada as the ?Emerging Energy Superpower’: Testing the Case.” 9.

⁶⁶ Annette Hester and Leah Lawrence. “A Sub-National Public-Private Strategic Alliance for Innovation and Export Development: The Case of the Canadian Province of Alberta’s Oil Sands.” CEPAL. (June 2008), http://www.cepal.org/comercio/noticias/documentosdetrabajo/1/34371/paper__AHester_web.pdf.

⁶⁷ “Historical Statistics 2008 edition.” BP. <http://www.bp.com/productlanding.do?categoryId=6929&contentId=7044622>.

⁶⁸ Personal conversation. (October 2008).

⁶⁹ Tammy Nemeth. “Continental drift: energy politics and Canadian-American relations,” in *Diplomatic departures: The conservative era in Canadian foreign policy, 1984-93*, edited by Nelson Michaud and Kim Richard Nossal. (Vancouver: UBC Press, 2001): 59-70, 61.

gasoline. "For more than 9 years [...] restrictive price controls have held US oil production below its potential, artificially boosted energy consumption, aggravated our balance of payments problems, and stifled technological breakthroughs," he said. He bet that the best way to promote conservation, increase domestic production, and find alternative sources would be to let markets set the price. Reagan was right. Although prices did rise as soon as they were deregulated, it did not take long before they started to decline. More importantly for the US, new production from Alaska, substitution of coal and nuclear for oil in electricity generation and increased vehicle efficiency resulted in imports falling to 28 percent of total US consumption, as the Arab OPEC market share took a tumble from 17 percent in 1973 to six percent in 1984.⁷⁰

While it took quite a few years for the US and Canadian economies to recuperate from those turbulent years, a slow period that allowed for prices to decline and economies to adjust, a long period of growth and prosperity followed. Many look back at this period as proof that free markets and deregulation are the only answer. Today, in the wake of the meltdown of financial markets and of the extreme volatility in oil prices, the pendulum is swinging the other way.

But in good times there is a tendency to 'leave well enough alone,' which certainly applies to the last few years of Canada's national energy policy. In fact, an examination of the current energy policy, as defined by the Department of Natural Resources (NRCAN), shows that Canada's response to current domestic and international energy challenges is a carbon copy of Brian Mulroney's prescriptions. Yet, as the story told in this essay shows, times have changed. Although oil prices are clearly set in international markets, access to supplies is not assured. A Canadian grand energy strategy must start by addressing Canada's own energy security – the cornerstone of future prosperity.

STEP V: CANADA'S ENERGY POLICY

The introduction to the text found in NRCAN's website extols the importance of energy to the Canadian economy:

[a]s the fifth largest energy producer in the world where oil production is increasing, Canada also is one of the highest per-capita consumers of energy in the world, reflecting our geography and climate, an energy-intensive industrial structure and a high level of income.⁷¹

NRCAN further explains the principles, agreements and accords by which the policy is guided. Regarding the principles, NRCAN's *Overview of Canada's Energy Policy* lists:

1. A market orientation

Markets are the most efficient means of determining supply, demand, prices and trade while ensuring an efficient, competitive and innovative energy system that is responsive to Canada's energy needs.

2. Respect for jurisdictional authority and the role of the provinces

Provincial governments are the direct managers of most of Canada's resources and have responsibilities for resource management within their borders.

3. Where necessary, targeted intervention in the market process to achieve specific policy objectives through regulation or other means

These policy objectives include issues of health and safety (e.g., pipeline regulation) and environmental sustainability.⁷²

⁷⁰ Jay Hakes. *A Declaration of Energy Independence*. 69.

⁷¹ "Natural Resources Canada" in *Overview of Canada's Energy Policy*. Accessed 24 August 2008, <http://www.nrcan-rncan.gc.ca/com/eneene/ovevue-eng.php>.

⁷² "Natural Resources Canada" in *Overview of Canada's Energy Policy*.

And regarding the most critical agreements and accords, NRCAN lists the:

- **Western Accord:** an agreement between the Governments of Canada, Alberta, Saskatchewan and British Columbia on oil and gas pricing and taxation
- **Agreement on Natural Gas Markets and Prices:** an agreement with the same western provinces
- **Atlantic Accords:** an agreement with Newfoundland and Labrador and with Nova Scotia, including the establishment of jointly managed Offshore Boards
- **Free Trade Agreement:** an agreement with the United States followed by the North American Free Trade Agreement (NAFTA). NAFTA is a cornerstone of our energy policy with regard to trade. It emphasizes the importance of competitive market behaviour and encourages investment in Canadian energy markets.⁷³

NRCAN also names the different regulatory and special programs and companies involved in energy policy, including the National Energy Board, the Canadian Nuclear Safety Commission, the Atomic Energy of Canada Limited and the Program on Energy Research and Development.⁷⁴

What NRCAN does not discuss are the challenges Canada faces or offers of a vision of how the country will ensure access and delivery to all corners of the land for all sources and types of energy in a sustainable manner. There is no discussion about the infrastructure needed to deliver oil and gas, nuclear, hydro, coal and a host of alternative fuels to attend to both transportation and electricity needs. There are no detailed plans on how the sustainability of production will be achieved – including the level and manner of future investments in technological development and a sound environmental plan.

Instead, the document outlined above reveals the extent to which policy makers have been paralyzed by the trauma of the policies of the Trudeau years, particularly the NEP. Other than the outdated principles of 1984, Canadian energy policy just does not exist.

Granted, natural resources are the purview of the provinces. Perhaps for that reason, the issue barely surfaced in the federal elections of 2006 and 2008. When it did, it was only in relation to environmental issues such as emissions and the need for alternative fuels. In terms of energy security and national policy, a search of the stories that appeared in the media in 2006 only finds one notable entry: an op-ed by University of Alberta Gordon Laxer, who is the director of the Parkland Institute. Laxer is well known for his views against Canada's obligations to export oil and gas to the US, as laid out in NAFTA's proportionality rule.⁷⁵ In his piece "Fuel this Debate," he suggests that Canadian energy security should be part of the national debate.⁷⁶ Given Laxer's defence of wholesale government intervention in energy markets, as well as the return to a sectoral framework that includes Canadian ownership and Crown corporations, it is not surprising that his ideas failed to get any traction.

Fast-forward to 2008. The issue of NAFTA came up during the American presidential nomination debate when then candidate Barack Obama suggested that if elected, he would renegotiate the agreement. Sensing a good opportunity, Gordon Laxer published another piece making the same points and using the same arguments that he had done in 2006.⁷⁷ This time, Peter Foster responded on the pages of the *National Post*. He centered his

⁷³ "Natural Resources Canada" in *Overview of Canada's Energy Policy*.

⁷⁴ "Natural Resources Canada" in *Overview of Canada's Energy Policy*.

⁷⁵ This rule contained in the original CUSFTA agreement Article 904, and then rolled into NAFTA, specifies that export restrictions can only be applied if "the restriction does not reduce the proportion of the total export shipments of a specific energy good made available to the other Party relative to the total supply of that good of the Party maintaining the restriction as compared to the proportion prevailing in the most recent 36-month period for which data are available prior to the imposition of the measure, or in such other representative period on which the Parties agree." See "External Affairs Canada" in André Plourde. "Canada's International Obligations in Energy and the Free Trade Agreement with the United States," in *Journal of World Trade*. is. 5. vol. 24. (New York: October 1990).

⁷⁶ Gordon Laxer. "Fuel this Debate," in *Globe and Mail*. (6 January 2006).

⁷⁷ Gordon Laxer. "Bitten by the deal that once fed us: Canadians should hope for an Obama presidency and the reopening of NAFTA," in *Globe and Mail*. (23 June 2008).

counter-argument on the basis that there are no reasons to renegotiate NAFTA, particularly on the energy front. Markets are working well, he observes. He brings back the ghost of the creation of Petro-Canada and the NEP to speculate that Dr. Laxer's thinking is the same that backed the Liberal policies of the late 1970s and early 1980s with disastrous effects.⁷⁸

Just like governments, academics seem stuck in the same era. In contrast to discussions in the US, where energy security defined much of the election campaign, and in spite of the fact that every other country in the world, from the US to China, from Brazil to India, from Japan to Norway, are having these discussions, Canadians appear to believe that their future energy supply is assured; free markets work, they are efficient, and will deliver. After all, many would argue, they have delivered unprecedented prosperity for over two decades.

Yet, there is scant evidence to back this claim. A closer examination of energy markets, particularly in Canada and the US, shows that although it is true that the 'honeymoon' period of the 1980s and 1990s brought about an end to price and export controls on oil and gas (but not, for instance, on ethanol), it is simply incorrect to suggest that the prosperity that ensued was brought about by free markets.

First, both in the US and in Canada, exploration and development of frontier oil and unconventional reserves depended on the direct hand of governments. Besides, the entire world competes for investment dollars set by their concession, royalty and fiscal regimes. Second, as described above, vehicle efficiency standards were not delivered voluntarily by industry, they were mandated by government. Third, technological breakthroughs did not happen without long term and massive financial investment by governments – both directly and through funding of research institutions. Fourth, the expenses incurred by the US military to ensure that oil from the Middle East flowed freely were not included in the world oil price, particularly during the Iran-Iraq war. Lastly, quietly behind the scenes, Saudi Arabia changed its strategy. Whereas in the 1970s it believed that constraining oil supply would bring prices up, by mid-1986 it had decided to flood the market to gain market share and drive higher cost producers and alternative fuels out. That year alone, Saudi Arabia increased production by a staggering 165 percent, adding up to four million b/d over the low point from the year before. The rest of OPEC followed suit.⁷⁹ Spot prices tumbled to US\$10 a barrel from US\$25 the year before.

In fact, worldwide, but particularly in Canada, energy markets and development, with very few exceptions, have always been and will continue to be all about politics. As mentioned before, the history of political intervention is rich. And of course, the NEP, the various accords, CUSFTA and NAFTA are all political tools. Politics can help or hinder, depending on whether they are effective in addressing issues that markets alone can't resolve. The relevant question is: is there a need for intervention in Canadian energy markets, and if so, what and where?

All about now

The saying used to be "if the US sneezes, Canada catches a cold." Given the high degree of integration between the two economies, this was not surprising. Now, however, the latest crisis in the US might show that the relationship has changed. It helps that Canada has been amongst the most fiscally prudent countries in the G8, such as running a budget surplus and funding pensions. But a large measure of Canada's prosperity is thanks to the western provinces, particularly Alberta, that have become the growth engines of the country. Activity in Saskatchewan has also increased substantially, as the province experiences a boom in oil and gas, as well as an increase in global demand and prices for grains, potash and uranium.

A recently released international trade report from Statistics Canada headlined: "Exports increase on strength of energy products." The report pointed out that energy exports had increased 11.5 percent in June 2008 alone,

⁷⁸ Peter Foster. "NAFTA and oil: Old ghosts and false fuel fears," in *Financial Post*. (24 June 2008).

⁷⁹ Jay Hakes. *A Declaration of Energy Independence*. 78.

the eighth consecutive monthly increase. In contrast, although exports of passenger autos did increase during the same month, total exports remained well below levels reached in 2007.⁸⁰ The shift in economic activity from east to west shows up clearly in further analysis of the export data. A comparison of resource exports from Alberta, British Columbia and Saskatchewan with the manufacturing and automotive sectors from Ontario and Quebec reveals that, in the first quarter of 2006 and 2007, the eastern provinces exported from \$3.7 to 4.9 billion more than their western counterparts. In contrast, in the first quarter of 2008, the gap had shrunk dramatically to an average of \$276 million.⁸¹ In terms of investment, 2008 estimates are for oil sands to command \$20 billion, which if realized, would top all spending in manufacturing.⁸²

Corporate income tax revenue originating in the west has increased significantly, which is of particular importance to the federal government. The average federal revenue from corporate Alberta from 2000 to 2004 was \$2 billion. In 2005 it jumped to \$3.1 billion, and the following year, it had shot up again, to \$4 billion. In 2007, the last year for which data is available, the revenues increased to \$4.85 billion.⁸³

Although this economic shift does enrich the federal coffers, it presents some significant challenges from a policy perspective. In general, policies designed to nurture the manufacturing sector seldom have the same effect on the resource sector. Although the current financial and economic crises have brought the Canadian dollar down, providing some relief to the battered manufacturing sector, the slowdown in the US economy and its devastating effects on the auto sector is sure to wreak havoc on the Ontario economy. In Alberta, the volatility in oil prices puts into question the hefty investments needed to establish additional oil sands production. Clearly, there is potential for dissent between east and west Canada as the regions compete for federal assistance and attention. In addition, the intersection between energy and environmental policies creates uncertainty and tensions of all kinds.

Still, to really understand the issues facing Canada's oil and gas industry, one must look west.

The Alberta Story...

Alberta is responsible for approximately 70 percent of the total oil production in Canada. While oil production has increased considerably in the last decade, production from conventional sources declined while bitumen (oil sands) production increased from 430,000 b/d to 1.184 mmb/d between 1996 and 2007.⁸⁴ This remarkable turn of events did not come by chance, it was encouraged by: a period of concerted effort to develop appropriate technology; a royalty regime designed to foster investments in exploration and production of unconventional oil (oil sands); a rise in global oil prices and unfavorable investment conditions in other oil jurisdictions.⁸⁵

This seems to be just the beginning. According to the Alberta government's own projections, oil sands production could top 3 million barrels per day by 2020 and possibly even 5 million barrels per day by 2030.⁸⁶ It is easy to understand such optimism. There are few places in the world with substantial upside where market-driven oil companies can invest. Alberta is proving to be a destination of choice.

All this activity has translated into an unprecedented influx of revenues to the resource owners, the provincial government. Not only did the government of Alberta pay off its debts in 2005, it has run a surplus averaging \$3.4 billion a year for the last thirteen years.⁸⁷

⁸⁰ Statistics Canada. "The Daily." Canadian International Merchandise Trade. (Tuesday 12 August 2008).

⁸¹ Calculated by the author from data International Merchandise Trade data provided by Statistic Canada.

⁸² Charles Frank. "Canada must be at Who's Who Oil Summit in Jeddah," in *Calgary Herald*. (Saturday 14 June 2008): D5.

⁸³ Revenue Canada. "Corporate income tax by provinces 1999 to 2006." Provided at the author's request.

⁸⁴ Government of Canada. Various reports. National Energy Board, www.neb.gc.ca.

⁸⁵ Until Venezuela's Chavez rise to power in 1999, that country led the world in the development of heavy oil, particularly of oil sands.

⁸⁶ Government of Alberta. "Alberta's Oil Sands." Accessed 23 November 2007, <http://www.energy.gov.ab.ca/OurBusiness/oilsands.asp>.

⁸⁷ Government of Alberta. "Budget 2008, Historical Fiscal Summary." 90. Averages calculated by the author.

Yet, all is not as rosy as it seems. The hyper pace of growth has caused much distress: construction costs have escalated, labour is in short supply, the infrastructure is both inadequate and stressed and, overall, the quality of life in Alberta is suffering.

Of great concern are issues of technology development and environmental stewardship. *In situ*⁸⁸ extraction technology – which was developed decades ago under the guidance of AOSTRA – is dependent on natural gas. This is unsustainable from a number of perspectives, but principally because it makes little sense to use a higher grade hydrocarbon to extract the “bottom of the barrel.” On the environmental side, production of unconventional oil, either mining or *in situ*, is extremely taxing on the environment. Estimates peg oil sands emissions at anywhere from one-and-a-half to three times higher than those from conventional production. As a result, Alberta is the largest greenhouse gas emitter in Canada, producing close to one third of the country’s emissions.⁸⁹ Moreover, oil sands production is water intensive and there are many challenges regarding the use and disposal of water, particularly in mining operations.

These challenges might prove to be the Achilles Heel of Alberta’s oil economy. Certainly, the perceived lack of vision regarding the management of the province’s resources and growth led to the public withdrawal of support for long-time Premier Ralph Klein, who opted to retire after receiving no more than lukewarm support at his party’s leadership review in 2007.

His successor, Premier Ed Stelmach,⁹⁰ seemed determined to show leadership and take control. After taking office, he announced tough changes to the existing royalty scheme in October 2007. The months that followed were among the most polarized in Alberta’s history. Oil companies were on one side of the divide, and warned of imminent disaster if the changes were implemented. On the other side, the government and a few academics maintained that it was time to update the royalty regime to reflect increasing oil prices. This second group also argued that a concentration of global resources in the hands of state oil companies made Alberta one of few places where private investment was welcomed, which would bring about a much-needed controlled slowdown on the pace of development.⁹¹ Then, in January 2008, in a move that could be interpreted as bowing down to industry pressures, Stelmach announced a “green plan” that extended greenhouse gas (GHG) reductions from the previous government’s target of achieving absolute reductions before 2020, to new targets where emissions would be allowed to grow by 20 percent to 2020, and be reduced by only 14 percent by 2050.⁹² The crux of his climate policy would be investments in carbon capture and storage (CCS), conservation and efficiency and clean technologies.

Albertans seemed happy with Stelmach’s direction, electing him as Premier with a solid majority in the March 2008 election, forming the 11th consecutive provincial Progressive Conservative majority government. Although the July announcement of a new four billion dollar climate change plan, of which \$2 billion will fund CCS projects while the second \$2 billion is earmarked for public transit initiatives in Alberta,⁹³ is clearly a step in the right direction, most would argue that the current provincial climate change policy is out of step with those of other provinces, the federal government and the province’s most important customer, the US. In fact, many insist that this policy is already dead, as the federal government has couched its own policies – promising 20 percent reduction in national emissions by 2020 – in terms of the existing Environmental Protection Act. Presumably the federal

⁸⁸ Of the total 174 billion bitumen proven reserves, only approximately 20 percent can be extracted by surface mining while the rest is at a depth of greater than 75 meters, and must be extracted *in situ*.

⁸⁹ “Premier Stelmach Fails to Deliver Action on Climate Change.” Media Release 1576. Pembina Institute, (24 January 2008).

⁹⁰ Ed Stelmach was elected leader of the Conservative Party of Alberta and became the thirteenth Premier of Alberta in December 2006.

⁹¹ Annette Hester and Leah Lawrence, “A Sub-National Public-Private Strategic Alliance for Innovation and Export Development: The Case of the Canadian Province of Alberta’s Oil Sands.”

⁹² Jeffrey Simpson. “The bell tolls for Alberta’s climate change policy,” in the *Globe and Mail*, (27 May 2008).

⁹³ Government of Alberta. “Alberta Surges Ahead with Climate Change Action Plan.” News Release. (8 July 2008). Accessed 22 September 2008. <http://alberta.ca/home/NewsFrame.cfm?ReleaseID=acn/200807/23960039FB54D-CC21-7234-31C3E853089A1E6C.html>.

government judges that this framework gives it uncontested jurisdiction over emission regulations.⁹⁴ In turn, citing government documents, others maintain that, in keeping with the Harper Conservative government's principle of primacy and respect for provincial jurisdiction, he intends to negotiate equivalency agreements on GHG industrial reductions with each province and then allow them to determine how best to implement the agreed targets.⁹⁵ Nevertheless, regardless of what the press, academics, or even industry representatives might say, the Alberta government vehemently insists that its climate change policy is a clear signal that it understands the issue and is addressing it effectively.

This position is becoming increasingly difficult to defend, even if Saskatchewan's Premier Brad Wall is ready to support it. After all, he also needs to address the environmental concerns that follow economic growth fueled by oil and gas activity. The premiers of Ontario, Quebec, British Columbia and Manitoba, however, have no such need or inclination. They are even ready to reject the federal program that is based on emissions intensity, which is much tougher than Alberta's proposal. These premiers are working on their own cap-and-trade system through a recent agreement between Ontario and Quebec, and in partnership with US states through the Western Climate Initiative and the Midwestern Greenhouse Gas Accord. Former Liberal leader, Stephane Dion, fought and lost the federal election of October 2008, mainly on the merits of his climate change plan, the Green Shift. Matthew Bramley, from the Pembina Institute, characterized the plan as a "broad based carbon tax and a later cap-and-trade system." Like most other consumers, Canadians seemed concerned with the environment; however, explaining the intricacies of environmental policies to the public proved extremely difficult. Moreover, when the reality of the costs embedded in such a proposal sank in, they turned away from it in droves. In the end it might not matter anyway. Most believe, and Prime Minister Harper's offer made to US President elect Barack Obama to negotiate a bilateral cap-and-trade system confirms speculation, that Canada will end up joining a national US system.⁹⁶

The conflicting provincial and federal policies, superimposed by federal mandates and legislation, only serve to bring enormous confusion and uncertainty to companies and individuals alike. Although the environment is only one of the aspects of energy policy, it is an important issue. Many would like to believe that the recent drop in prices combined with an economic slowdown will dampen the sustainable energy advocates' momentum. They might be right. Still, even if this is the case, judging by the amount of environmental legislation before the US and many other countries' congresses and parliaments, both in developed and developing countries, this issue is not going away.

The matter of environmental sustainability of energy production illustrates the enormous challenges of reconciling federal and provincial jurisdictions in an extremely complex global scenario particularly in a country, such as Canada, where provinces have diverging strategic interests.

The actions of Newfoundland and Labrador's Premier Danny Williams show that even within Canada, politics have a huge effect on energy policy. Currently, the province is responsible for 16 percent of Canada's oil production. But Williams is banking on the future, which, as far as he is concerned, must include direct provincial participation in all aspects of oil development. Williams is not afraid to be controversial; in fact, he seems to relish this prospect. In many ways, he is emulating former Alberta Premier, Peter Lougheed's dealings with Syncrude and the federal government. In his quest to become an equity participant in the province's biggest offshore oil play, the Hebron field, Williams went head to head with the consortium licensed to explore it, and did not blink. The arm twisting took two years, but in August 2008, after intense negotiations, Chevron Canada, and its partners ExxonMobil Canada, Petro-Canada and StatoilHydro Canada, agreed to give Newfoundland and Labrador a 4.9 percent stake

⁹⁴ Jeffrey Simpson. "The bell tolls for Alberta's climate change policy."

⁹⁵ Environment Canada. "Regulatory Framework for Industrial Air Emissions." (April 2007), http://www.ec.gc.ca/doc/media/m_124/p2_eng.htm#b.

⁹⁶ "Canada to push climate agreement on Obama government." CBC News. (5 November 2008), <http://www.cbc.ca/canada/story/2008/11/05/canada-us-environment.html>.

in Hebron in exchange for \$110 million upfront and a participation in the project's future costs.⁹⁷ Williams also took on the federal government of Stephen Harper. The issue was the 2007 budget and a clawback on equalization agreement over offshore oil royalty payments. This time it was Harper who did not blink. Williams, a Conservative, showed his displeasure by actively campaigning against Harper, but his efforts received little support in the rest of Canada. Nonetheless, their interactions signal that as energy prices rise, so do the stakes.

Consider also the following: when the informal agreement that Eastern Canada would be supplied by imported oil was reached in 1959, the main producer in Montreal, Imperial Oil, had leases in Venezuela. At the time, Venezuelan oil was considerably less expensive than Western Canada's. Consequently, Imperial wanted assurances that it could import inexpensive oil into its refineries, and then sell product at substantial profits in the US Eastern markets. Not much changed for decades. However, when Exxon recently walked away from Venezuela, Imperial Oil, which is owned by Exxon, seemed inclined to feed its Montreal refinery with oil from Alberta. Towards this end it has been requesting Enbridge, who operates the pipeline linking Ontario to Quebec, called Line 9, to reverse the flow of oil so it would go to Montreal instead of "from" that city. Now, Enbridge has revealed plans to do just that. This reversal would result in Alberta oil reaching Montreal once again, and before long, without much government intervention (other than pipeline approvals by the National Energy Board), Canada would increase its domestic oil consumption. Instead of rejoicing over the outcome, it appears that many groups in Quebec are pressuring Premier Jean Charest to act as an intervener at the pipeline hearings, against such a project. The main objection is the environmental footprint of Alberta oil.

It is curious that the same environmentalists do not seem to question the footprint of other sources, such as gas flaring or the emissions from the bunker fuel it takes to bring these resources from afar. There are other considerations as well. As Konrad Yakabuski asks in his *Globe and Mail* article,

given the fact that Algeria, Britain, Norway, Angola, and Venezuela are the main suppliers, is the oil sands environmental record a good enough reason for a Canadian province to prefer buying oil from Algeria, where a terrorist bomb last month killed 12 employees of Montreal-based SNC-Lavalin?⁹⁸

Or should Quebec rely on the declining reserves of Britain and Norway? Perhaps Quebecers should be reminded that should there be any disruptions to oil production in Angola, deliveries to Quebec are unlikely to be given preference over those to China.

The answers to these questions are even more pertinent when you consider that President-elect Obama has vowed to make investments in alternative fuels and a "green" economy, a cornerstone of his economic stimulus package. Meanwhile, Alberta's oil sands region takes the rap for dirty oil. It will take more than propaganda to clean up the mess, and markets alone will not be able to provide the solution.

There is a pressing need for the vision and actions of Premier Lougheed: a concerted effort to develop new technologies, in the same manner as in the times of AOSTRA,⁹⁹ that will extract oil from the sands without using natural gas; that will address the challenges of water usage and that will account, capture, use and sequester the carbon produced. Furthermore, although an overall policy aimed at moving towards a low carbon society is welcomed, it is paramount for Alberta and Canada's future prosperity that hydrocarbons produced sustainably are seen as an acceptable intermediate alternative.

⁹⁷ Canwest News Service. "Williams says Hebron Deal makes us masters of our destiny" in *Financial Post*. (20 August 2008).

⁹⁸ Konrad Yakabuski. "Alberta dirty oil a sticky problem for Charest," in *Globe and Mail*. (18 September 2008).

⁹⁹ AOSTRA's model consisted of a public-private partnerships where the government retains the ownership of the technologies and makes it available to all companies for a fair price. For a detailed explanation see: Annette Hester and Leah Lawrence. "A Sub-National Public-Private Strategic Alliance for Innovation and Export Development: The Case of the Canadian Province of Alberta's Oil Sands."

On international energy policy...

The fact that provinces act in their own self-interest in the narrowest of senses only serves to exacerbate the challenges of devising an energy policy that will make sense for Canada as a nation. Given the high stakes of global oil and gas politics, it stands to reason that fragmenting Canada's dealings with a strong counterpart, such as the US, may result in undermining the country's overall goals and ambitions. And if that is the case, designing a coherent international energy policy will be even more difficult.

The present...

Judging by Prime Minister Harper's focus on the Arctic, with special mentions in policy statements and visits to the region, he recognizes the winds of change in the global geopolitical construct. The effects of climate change are rendering this region the last frontier of oil development. Although the US Geological Survey estimates of the Arctic containing 20-25 percent of world oil resources¹⁰⁰ may be inaccurate, Shell's willingness to fork out \$2.1 billion in a 6 February 2008 Alaska lease sale¹⁰¹ serves as an indication that companies are ready to move in. The region's governments, principally Russia and the US, but also Denmark and Norway, also want to ensure their access and control of resources.

Unlike the conflicting jurisdictions he faces in the rest of Canada, in the Arctic, Harper does not compete with or need to accommodate other political powers since natural resources are federally regulated. The sole exception is his need to work with aboriginal communities where land claims are important to pipeline developments, still need to be resolved. The jurisdictional clarity helps explain why, only in regards to the Arctic, as opposed to the rest of Canada, there is a statement of objectives and a concerted effort to develop coordinated and coherent policies. Still, according to Rob Huebert, Canadian International Council (CIC) Senior Fellow and Arctic expert, the needed budgetary allocations are still to be made, and of course, the proof will be in the pudding. Whether his focus on strengthening the domestic instruments will enable Canada to be a strong player; or simply because he either does not concentrate his efforts on the issue or does not believe it to be relevant, the greatest weakness is in his positioning of Canada is in the international arena.

This weakness is only amplified in the energy file, an area where the Prime Minister appears unable to control the wayward and independent-minded premiers of Alberta and Newfoundland. Add to these circumstances NRCAN's recent need to reconcile energy policy with a mandate focused on sustainable development,¹⁰² plus the ongoing tensions between NRCAN and DFAIT and the current mistrust between the Prime Minister's Office and the federal bureaucracy, and it is not surprising that the current international energy policy is so thin as to be impossible to define. In fact, as the insightful commentator of Canadian politics, Lawrence Martin, points out, Harper's commitment to decentralization and strong provincial powers makes drafting national policies in areas of provincial jurisdiction almost impossible.¹⁰³

The Current State of Affairs: Canada's international energy policy or all about Canada as an Energy Superpower

Canada's strategic interests in the international energy arena are still primarily defined by its need to ensure continuous access to the US market and the ability to attract the hefty investments in order to develop its resources. The addition of the environment to the energy file years is the main development in the last few. Although access to

¹⁰⁰ Robert Huebert. "Canadian arctic security: understanding and responding to the coming storm." Canadian International Council. (July 2008).

¹⁰¹ Sonja Franklin. "Shell Offered Air Permit for Rig in Beaufort Sea (Update2)." (26 February 2008), <http://www.bloomberg.com/apps/news?pid=newsarchive&sid=a5fl0CBhS1E>.

¹⁰² For an in depth treatment of this issue, see: *Canadian Energy Policy and the Struggle for Sustainable Development*. edited by Bruce Doern. (Toronto: University of Toronto Press, 2005).

¹⁰³ Personal conversation. (August 2008).

the US is not an issue, creeping environmental legislation, at a minimum, will make the industry much less profitable. A decline of returns to investors will make securing investments even more difficult. Given the complexities of encompassing many different portfolios into one policy, it is not surprising that, like many other countries, Canada does not have a statement defining such policy.

In private conversation, department officials have said that NRCAN is in the process, or at least, was, prior to the 2008 federal election, of defining one. It appears, however, that it is a difficult task to reconcile the three main principles that must frame any energy policy document with the changing international energy game: the primacy of markets, provincial jurisdiction and the right to use regulatory measures to deal with specific issues. Unfortunately, given the Harper government's penchant for secrecy, if such document indeed exists, its contents are a mystery.

Nonetheless, there are many other documents that individually address specific aspects of international energy policy. For instance, the concept of international policy appears in reference to the agreements that Canada is a part of in a bilateral context, or as part of the International Energy Agency. A report to Parliament under the Energy Efficiency Act for the Fiscal Year 2005-2006 on "Improving Energy Performance in Canada," makes reference to several research and development agreements, including various memoranda of understanding with China, Mexico and the US. And it singles out the work the department is doing with the North American Energy Working Group.¹⁰⁴

However, it is impossible to distil an overall plan from them. Harper's mantra that Canada is an "emerging energy superpower" is the only indication of the direction the government has taken. He mentioned it on the first stop of his first trip abroad, to London in 2006, and since has upped the ante by saying that his country could and should become a "clean energy superpower." Although many have argued with substantive reasoning, including the author, that Canada is not a superpower and more importantly, does not want to be one, the Prime Minister is unrepentant. He continues to link Canada to the concept of a green or clean energy superpower.¹⁰⁵

The meaning of 'superpower,' particularly in the international context, is well understood. In terms of 'energy superpower,' it would include having abundant resources, but with enough control to be able to use them as a political tool. It includes market control and the willingness to use these resources to assert power and force others to do something they otherwise would not do. In addition to those attributes, a green energy superpower, at a minimum, would need to demonstrate above world average usage of renewable energy sources: Canada does not qualify, either in the politics of energy or environmental criteria. Despite their centrality in lengthy political discussions, as far as renewable resources are concerned, which are an imperfect but useful proxies for clean energy, they account for only 15 percent of all energy used in Canada; barely above the world average of 14 percent and significantly below Brazil's outstanding 45 percent.¹⁰⁶

In short, this is one concept neither the Prime Minister of Canada nor Canada's mandarins can define at will. Moreover, few ideas are as "un-Canadian." While superpowers like Russia coerce others by intimidation and aggression, Canadians value cooperation, consensus and playing the "good guy."

In contrast to the tough talk, Canada's behaviour has not changed. It has reverted to its historical position of asking to be exempt from specific US trade and other rules. Prior to the CUSFTA there were several occasions where Canada was treated differently than other nations, such as during both World Wars when shortages in the US implied domestic rations, yet Canada's request for help was answered such as when Canada was exempt from

¹⁰⁴ Natural Resources Canada. *Improving Energy Performance in Canada*. Report to Parliament under the Energy Efficiency Act For the Fiscal Year of 2005-2006. <http://oee.rncan.gc.ca/publications/statistics/parliament05-06/index.cfm?attr=8>.

¹⁰⁵ Stephen Harper. Speech. (Estevan, Saskatchewan: 25 March 2008).

¹⁰⁶ Jennifer Welsh and Annette Hester. "Superpower? Oil could make Stephen Harper a superhero," in *Globe and Mail*. (2 February 2008).

American import quotas during the Eisenhower presidency. In reality, CUSFTA and then NAFTA go a long way in protecting Canadian producers from the vagaries of their neighbour's political whims. Now the battle has shifted to the environmental front. The issue is the Energy Independence and Security Act of 2007, where article 526 "prohibits federal agencies from procuring synfuel unless its life cycle GHG emissions are less than those for conventional petroleum sources."¹⁰⁷ Although Americans have assured Canadian officials that this was not meant to include Canada, a change in the legislation will be necessary to allow that oil that comes from the oil sands is used by the government vehicle fleet. Needless to say, Canadian and Albertan government officials are lobbying hard to ensure that Canada is exempt from this rule.

These are not the actions of a "clean energy superpower." Insisting on this moniker only weakens Canada's hand. Besides, a different approach might make Canada a winner. Oxford professor and author Jennifer Welsh and I have argued that Canada is a much more valuable player as a constructive and responsible partner. This is particularly so because it is exactly what our neighbour and biggest ally, the US, could use right now.

STEP VI: THE GRAND ENERGY STRATEGY

As the US slowly turns its attention away from the Middle East, it is a likely possibility that it will turn to the Western Hemisphere, from the Arctic to Antarctic. It is thus a critical time for Canada to reconfigure its energy policies and image – both at home and abroad. The challenges, however, will be significant.

From a domestic perspective, dealing with the Arctic might prove easier from a policy design point of view, but negotiating with the indigenous groups is likely to be as challenging as negotiating with provinces. Still, given the region's importance as a future energy supplier, the policies that are designed for the sector in that region will need to be coherent and cohesive with those dealing with the same issues elsewhere in Canada.

Still there is no indication that the Prime Minister is thinking in terms of Canadian energy security and that he is prepared to define a vision and design policies to achieve its goals. In other words, it does not appear that Stephen Harper believes a grand strategy is necessary for the nation's future prosperity.

Yet, he could take Peter Lougheed as an example of a leader who was capable of gaining his constituents' trust by articulating a vision that resonated with their own aspirations. Rather than telling everyone that Canada is an energy superpower, a rather empty concept, Prime Minister Harper should give Canadians an inspired vision of where he can take Canada in the Western Hemisphere.

Senator Pat Carney – who, despite being an energy opposition critic, did most of the groundwork for Energy Minister's endorsement of the Mulroney-era regional energy accords – suggests that the only way to construct such a vision is to repeat the successful strategy which led to the previous accords.¹⁰⁸ These accords were a product of an extensive sectoral and regional consultative process. These consultations brought together small groups with similar concerns and interests to discuss specific issues. Once issues had been defined, the discussion moved to higher levels on both federal and provincial sides. Coordination of the whole process was in the hands of a minister who reported directly to the Prime Minister.

Much work has already been done towards reaching consensus on what this energy policy would include. In particular, the Energy Pathways Reports and Workshop Series conducted by the National Academies of Sciences and Engineers is worthy of careful attention. And perhaps Harper should consult with the provinces as to their

¹⁰⁷ Fred Sissine. "Energy Independence and Security Act of 2007: A Summary of Major Provisions." Congressional Research Service. (Washington D.C.), http://energy.senate.gov/public/_files/RL342941.pdf.

¹⁰⁸ Personal Conversation. (August 2008).

idea of a national and international energy policy vision and, once they have a vested interest, they are more likely to make it work at the provincial level. It is an idealistic approach, which is made more challenging because some provinces, especially Alberta, need to balance a number of demands from different type of producers, including conventional and unconventional, domestic independent and small producers, as well as the multi-nationals.

In a way the economic downturn provides a benefit here. There is time and space for the Prime Minister to coordinate a national plan directly with the provincial premiers, particularly because as this paper argues, Canada's prosperity is directly linked to a coherent energy policy.

The importance of hydrocarbons to the Canadian economy, the health of its own environment, and its responsibility to its citizens, future generations and the world, requires that the sustainability of hydrocarbon resources be Canada's top priority.

Instead of being seen as a potential drag on the economy, however, carbon should be treated as Canada's opportunity. In this day and age, any country that comes up with new ideas and technologies to use, store and dispose of carbon, will lead the way to the future. Canada should become known as the country that can tell you about "the 1001 ways of using carbon." From there, related policies can always be judged by asking whether they make a contribution to the sustainability of hydrocarbon resources.

That is not to say that Canada should not pursue alternative energy sources and the greening of its economy. These objectives, however, can be achieved by adopting technologies developed by others, or by importing fuels that are more efficiently produced elsewhere. It is crucial to realize that resources, including financial, are finite and single-minded purpose is necessary to achieve these complex objectives in a short period of time.

This goal will only come to fruition if a technological leap can be engineered. Towards this end, the Canadian government should champion a new governance model for technology development using the same principle Alberta Premier Lougheed applied to AOSTRA. Such a system would bring together federal and provincial governments in association with private enterprise. Governments would nurture it by providing adequate long-term funding in a governance structure that, as much as possible, insulates it from political interference. And most importantly, this structure would ensure that the government is the final owner of the technology. This ownership would give the federal government the right to make it available, for a fair price, to any domestic player, thus allowing for faster dissemination of technological advancements. The time of taxpayers' dollars going directly to one single enterprise that is under no obligation is over. Furthermore, this model would facilitate international collaboration, allowing for much greater and faster regional and/or international private sector advancement.

Now, an international energy policy...

If Canada had a coherent energy policy, it could take a leadership role in the Western Hemisphere and in the Arctic. In spite of the turmoil created by Chavez, there is much promise in this hemisphere. Still, Canada's links in the hemisphere are not strong enough to allow improvement of its energy infrastructure alone. Consequently, chances of building constructive energy architecture in this hemisphere would be much greater if Canada could partner with Brazil to build an energy partnership in the Americas. Much like Canada, Brazil faces the challenges of developing an oil frontier that will see an enlargement of its carbon footprint. Moreover, when it comes to the US, Brazil sees continued tariff and non-tariff barriers to its sugar-cane ethanol. Having a partnership approach, particularly with the US, will ensure that neither country feels like it is cornered in negotiations.

This partnership could bring countries together in developing technologies that ensure environmental sustainability, design and offer training programs to prepare a much needed workforce, share best practices in regulatory frameworks to ensure the region attracts the necessary infrastructure investments, and provide a forum where discussions on a future environmental stewardship accord could take place.

The long-term goal would be to create an integrated energy initiative in the hemisphere with coherent energy and environmental policies and trading systems. Fortunately, in contrast to the history of Western involvement in the Middle East and Caspian Sea, there is no legacy of interference and belligerence in the energy affairs of the Americas. That means that in this new construct, the political power asymmetries are secondary to the equilibrium brought by each nation's own treatment of their energy sector's development. Here, incentives to collaborate will be much stronger than the forces of opposition. After all, as shown in this essay, it is in everyone's best interest to ensure that collaboration and cooperation define the region's relationships. That said, although there are no incentives to oppose the overall objectives of a regional energy partnership, it is likely that some countries, or even groups within countries, might oppose specific initiatives. It is impossible to predict how Chavez and his cohorts will react. Trade concessions in biofuels will almost certainly be part of any agreements, no matter how loose. It is certain that the powerful Canadian and American agricultural lobbies, who are now fuel providers, will make every effort to block the free flow of a much more competitive Brazilian biofuel. Yet, ultimate success will hinge on Canada and the US' ability to walk the walk, and not just talk the talk. These two countries should take this opportunity to bypass not only the agriculture lobby, but all lobby groups, and construct a relationship that levels the playing field amongst all sources of energy.

From the basis of bilateral, trilateral and regional alliances, other arrangements could be built. For instance, China and Australia could join in the development of clean coal technologies. The ideas are many, and the possibilities are endless.

STEP VII: IN THE END

Decades of global prosperity and growth have indelibly changed the geopolitics of energy. This is a new era. If the US, Britain and Arab OPEC designed the rules in the past, now Russia, China and individual producers call the shots. If the large oil multinationals, the Seven Sisters, were the main players before, now state oil companies will take command. And if the concept of free markets provided the underlying basis for energy development, now governments will be expected to play a much bigger part.

This new paradigm is an unexpected development. Only a few months ago few would have agreed that the world was about to return to the historical norm of a strong government hand in the affairs of nations. Now it is clear that this will be the case. In hindsight, it is the last two decades that will be judged by future generations as the exception to the rule.

These are the early days, and it still uncertain on how long it will take for the US to reposition itself. Nonetheless, the options are few. It might take time, but eventually the US will turn its attention to the Western Hemisphere. When this refocus occurs, America's perception of Canada will depend solely on how Canada chooses to play this game.

Unquestionably, Canada has been lucky. It was given abundant energy resources. Transforming these resources into viable economic assets, however, took years of concerted efforts by all levels of government, and ingenuity from its people. And it took visionary leadership that was not afraid to go against the status quo and to make mistakes.

Once again, the rise of energy as a major issue in the global economy will bring about challenges to the cohesiveness of the Canadian federation. This time around, concerns over climate change and the environment will only serve to magnify these challenges. If Canada can solve its own energy challenges, it stands to lead the global energy economy in the most constructive way. It is a game worth playing with care and imagination. The stakes are high, but then, so is the prize: prosperity in a peaceful and sustainable world.

ACRONYMS LIST

AIOC	Anglo-Iranian Oil Company
AOSTRA	Alberta Oil Sands Technology and Research Authority
APOC	Anglo-Persian Oil Company
CCS	Carbon capture and storage
CIA	Central Intelligence Agency
CIC	Canadian International Council
CNOOC	China National Offshore Oil Corporation
CNPC	China National Petroleum Corporation
CUSFTA	Canada-United States Free Trade Agreement
EIA	Energy Information Administration
NAFTA	North American Free Trade Agreement
NEP	National Energy Program
NRCAN	Department of Natural Resources
OPEC	Organization of the Petroleum Exporting Countries
PdVSA	Petróleos de Venezuela S.A.
Sinopec	China Petroleum and Chemical Corporation

BIBLIOGRAPHY

Interviews

- Bothwell, Robert. Author's Communications. 2008.
- Carney, Pat. Author's Communication. August 2008.
- English, John. Author's Communication. 2008.
- Halberszadt, Dawid. Author's Communications. August 2007.
- Martin, Lawrence. Author's Communications. 2008.
- Verrastro, Frank. Author's Communication. September 2008.

Books (and chapters in books)

- The Churchill-Eisenhower Correspondence, 1953-1955.* edited by Peter G. Boyle. UNC Press, Chapel Hill: NC, 1990.
- Canadian Energy Policy and the Struggle for Sustainable Development.* edited by Bruce Doern. Toronto: University of Toronto Press, 2005.
- The Global Politics of Energy.* edited by Kurt Campbell and Jonathan Price. Washington DC: The Aspen Institute, 2008.
- Hakes, Jay. *A Declaration of Energy Independence.* Hoboken, New Jersey: John Wiley & Sons, Inc., 2008.
- Nemeth, Tammy. "Canada-U.S. oil and gas relations, 1958 to 1974." Doctoral degree thesis. University of British Columbia, 2007.
- Nemeth, Tammy. "Continental drift: energy politics and Canadian-American relations," in *Diplomatic departures: The conservative era in Canadian foreign policy, 1984-93.* edited by Nelson Michaud and Kim Richard Nossal. Vancouver: UBC Press, 2001. 59-70.
- Nemeth, Tammy. "Duel of the Decade," in *Alberta formed Alberta transformed.* edited by Michael Payne, Donald Wetherell and Catherine Cavanaugh. Edmonton: University of Alberta Press, 2005. 677-702.
- Weintraub, Sidney and Annette Hester. "Canada," *Energy Cooperation in the Western Hemisphere.* edited by Sidney Weintraub Sidney et al. Washington, D.C.: CSIS, 2007.

Academic papers

- Abdelal, Rawi and Adam Segal. "Has Globalization Passed Its Peak?" *Foreign Affairs*, 86 (January/February 2007): 103-114.
- Bramley, Matthew. "Far from Turning the Corner," *Carbon Finance*, (June 20, 2008). Accessed 22 September 2008, <http://climate.pembina.org/op-ed/1661>.

Congressional Research Service. "Energy Independence and Security Act of 2007: A Summary Major Provisions." CRS Report for Congress. (December 21, 2007), http://energy.senate.gov/public/_files/RL342941.pdf.

Cohen, Ariel. "Europe's Strategic Dependence on Russia's Energy." The Heritage Foundation, Backgrounder #2083. (November 2007). <http://www.heritage.org/Research/Europe/bg2083.cfm>.

Corkin, Lucy. *China's Interest and Activity in Angola's Construction and Infrastructure Sectors*. Stellenbosch, South Africa: Centre for Chinese Studies at Stellenbosch University. Accessed 2 August 2006, <http://www.focusweb.org/images/stories/china/angola%20report%2031%20august%202006.pdf>.

Hester, Annette. "Canada as the "Emerging Energy Superpower: Testing the Case." Canadian Defense and Foreign Affairs Institute. (October 2007).

Hester, Annette and Leah Lawrence. "A Sub-National Public-Private Strategic Alliance for Innovation and Export Development: The Case of the Canadian Province of Alberta's Oil Sands." CEPAL. (June 2008), http://www.cepal.org/comercio/noticias/documentosdetrabajo/1/34371/paper__AHester_web.pdf.

Huebert, Robert. "Canadian arctic security: understanding and responding to the coming storm." Canadian International Council. (July 2008).

Plourde, Andre. "Canada's International Obligations in Energy and the Free Trade Agreement with the United States," *Journal of World Trade*. 24, is. 5. (New York: Oct 1990): 35-57.

Pratt, David. "Is there a Grand Strategy in Canadian Foreign Policy?" *Journal of Military and Strategic Studies*. Lecture Three: Ross Ellis Memorial Lectures. 20, is. 2. (Winter 2008): 1-28.

Shinn, David H. "China in Africa: Military and Security Relations." Lecture presented at the Kennedy School of Government. Cambridge, MA: 1 June 2007. In Annette Hester. "Canada as the 'Emerging Energy Superpower': Testing the Case." Canadian Defense and Foreign Affairs Institute. October 2007.

Sissine, Fred. "Energy Independence and Security Act of 2007: A Summary of Major Provisions." Congressional Research Service. Washington D.C., http://energy.senate.gov/public/_files/RL342941.pdf.

Yenikayeff, Shamil. "The Georgia-Russia standoff and the future of Caspian and Central Asian energy supplies." *Oxford Institute for Energy Studies*. Oxford Energy Comment. (August 2008).

News articles

Associated Press. "China foreign exchange reserves at \$1.905 trillion," in *International Herald Tribune*. 14 October 2008.

Austen, Ian. "Head of Canadian Nuclear Regulator Fired," in *New York Times*. 17 January 2008.

Baker, James A. III., "America's Vital Interest in the "New Silk Road"" *New York Times*, July, 21, 1997. Accessed 19 September 2008, <http://query.nytimes.com/gst/fullpage.html?res=9803E6DD143AF932A15754C0A961958260>.

Canwest News Service. "Williams says, 'Hebron Deal makes us masters of our destiny.'" *Financial Post*. 20 August 2008. <http://www.financialpost.com/story.html?id=737382>.

- CBC News. "Canada to push climate agreement on Obama government." 5 November 2008, <http://www.cbc.ca/canada/story/2008/11/05/canada-us-environment.html>.
- "Central Asia Pipeline to Secure Gas for China" in *Chinastakes.com*. 2 July 2008, <http://www.chinastakes.com/story.aspx?id=480>.
- Foster, Peter. "NAFTA and oil: Old ghosts and false fuel fears," *Financial Post*, 24 June 2008.
- Frank, Charles. "Canada must be at Who's Who Oil Summit in Jeddah," *Calgary Herald*, Saturday 14 June 2008. D5.
- Franklin, Sonja. "Shell Offered Air Permit for Rig in Beaufort Sea," *Bloomberg.com*, 26 February 2008. <http://www.bloomberg.com/apps/news?pid=newsarchive&sid=a5fl0CBlhS1E>.
- Helleiner, Eric. "The Return of Regulation, and what a difference a decade makes," *Globe and Mail*. 18 September 2008.
- Jahn, George. "UN: Iran Blocking Nuke Probe", *Time*. 15 September 2008, <http://www.time.com/time/world/article/0,8599,1841186,00.html>.
- Kinzer, Stephen. "Summit in Turkey: The Caspian Accord: Caspian Lands Back a Pipeline Pushed by West," *New York Times*. 19 November 1999.
- Laxer, Gordon. "Fuel this Debate," *Globe and Mail*. 6 January 2006.
- Laxer, Gordon. "Bitten by the deal that once fed us: Canadians should hope for an Obama presidency and the reopening of NAFTA," *Globe and Mail*. 23 June 2008.
- McCain, John. "John McCain On Energy for a Secure Nation," Press Release. 23 June 2008. <http://www.johnmccain.com/Informing/News/PressReleases/f1a7b94c-5df9-4635-9b06-5618454bb82d.htm>.
- Mercopress. "World's 5th: Brazil's pre-salt oil might top 100 Billion barrels." 8 November 2008. Accessed 12 November 2008, <http://www.brazzilmag.com/content/view/10160/>.
- "Mexico Senate approves weak oil reform." *Oxford Analytica*. 27 October 2008.
- Nolen, Stephanie. "Angola Chooses Homegrown Economic Remedy," *Globe and Mail*. 19 September 2008.
- "Past Podcasts: The House." CBC Radio. 24 May 2008, <http://www.cbc.ca/podcasting/pastpodcasts.html?13#ref13>.
- Pembina Institute. "Premier Stelmach Fails to Deliver Action on Climate Change." Media Release 1576. 24 January 2008, <http://www.pembina.org/media-release/1576>
- Simpson, Jeffrey. "The bell tolls for Alberta's climate change policy," *Globe and Mail*. 27 May 2008.
- Welsh, Jennifer and Annette Hester. "Superpower? Oil could make Stephen Harper a superhero," *Globe and Mail*. 2 February 2008.
- Worth, Robert and Jad Mouawad. "Agreements are Elusive at Oil Talks in Saudi Arabia," *New York Times*. 23 June 2008.
- Yakubski, Konrad. "Alberta dirty oil a sticky problem for Charest," *Globe and Mail*. 18 September 2008.

Other sources

"General operations of the Baku-Tbilisi-Ceyhan Pipeline." BP, <http://www.bp.com/genericarticle.do?categoryId=9006669&contentId=7014361>.

Bajoria, Jayshree. "Russia's Security Ties in Asia," Daily Analysis. Council on Foreign Relations. 28 August 2008.

Bothwell, Robert. "Pipeline Debate," *The Canadian Encyclopedia Historica*. Accessed 2 August 2007, www.thecanadianencyclopedia.com/PrinterFriendly.cfm?Params=A1ARTA0006305.

BP Statistical Review of World Energy. June 2008, <http://www.bp.com/productlanding.do?categoryId=6929&contentId=7044622>.

Bush, George W. "State of the Union Speech." 31 January 2006, <http://www.whitehouse.gov/news/releases/2006/01/20060131-10.html>.

Carter, Jimmy. "State of the Union Address 1980." *The Jimmy Carter Library, selected speeches*. 23 January 1980. Accessed 17 September 2008, <http://www.jimmycarterlibrary.org/documents/speeches/su80jec.phtml>.

EIA Country Analysis Briefs: Brazil. Updated October 2008, <http://www.eia.doe.gov/emeu/cabs/Brazil/Full.html>.

EIA Country Analysis Briefs: Russia. Updated May 2008, <http://www.eia.doe.gov/cabs/Russia/pdf.pdf>.

EIA Country Analysis Briefs: China. Updated August 2006, <http://www.eia.doe.gov/emeu/cabs/China/Full.html>.

EIA Country Analysis Briefs: Iran. Updated October 2007, <http://www.eia.doe.gov/cabs/Iran/pdf.pdf>.

EIA Country Analysis Briefs: Persian Gulf Region, Background. Updated June 2007, http://www.eia.doe.gov/emeu/cabs/Persian_Gulf/Background.html.

EIA Country Analysis Briefs: Saudi Arabia, Oil Exports and Shipping, Updated August 2008. http://www.eia.doe.gov/emeu/cabs/Saudi_Arabia/OilExports.html.

EIA Statistics, Petroleum Imports by Country of Origin, 1960-2007, <http://www.eia.doe.gov/aer/txt/ptb0504.html>.

Engahl, William. "Oil and the origins of 'War to Make the World safe for Democracy'" 22 June 2007. Accessed 18 September 2008, http://www.engdahl.oilgeopolitics.net/History/Oil_and_the_Origins_of_World_W/oil_and_the_origins_of_world_w.HTM#_edn14.

Environment Canada. "Regulatory Framework for Air Emissions: II. Regulatory Framework for Industrial Air Emissions," http://www.ec.gc.ca/doc/media/m_124/p2_eng.htm#b.

Government of Alberta. Accessed 23 November 2007, <http://www.energy.gov.ab.ca/OurBusiness/oilsands.asp>.

Government of Alberta, Budget 2008. Historical Fiscal Summary. http://www.finance.alberta.ca/publications/budget/budget2008/fiscal_tables_charts.pdf.

Government of Alberta, "Alberta Surges Ahead with Climate Change Action Plan," News Release. 8 July 2008. Accessed 22 September 2008, <http://alberta.ca/home/NewsFrame.cfm?ReleaseID=/acn/200807/23960039FB54D-CC21-7234-31C3E853089A1E6C.html>.

Harper, Stephen. "Address at the Canada-U.K. Chamber of Commerce." London, England: 29 May 2008, <http://pm.gc.ca/eng/media.asp?category=2&id=2131>.

Harper, Stephen. "PM and Saskatchewan Premier announce major carbon capture and storage project." Speech. Estevan, Saskatchewan: 25 March 2008.

McCain, John. *McCain on Energy for A Secure Nation*. 23 June 2008, <http://www.johnmccain.com/Informing/News/PressReleases/f1a7b94c-5df9-4635-9b06-5618454bb82d.htm>.

National Energy Board of Canada. Various reports, www.neb.gc.ca.

National Petroleum Council. "Hard Truths: Facing the Hard Truths about Energy." A NPC Report. 2007, <http://www.npchardtruthsreport.org/>.

Natural Resources Canada, Overview of Canada's Energy Policy. Accessed 24 August 2008, <http://www.nrcan-rncan.gc.ca/com/eneene/owevue-eng.php>.

Natural Resources Canada, "Improving Energy Performance in Canada – Report to Parliament Under the Energy Efficiency Act For the Fiscal Year 2005-2006," <http://oe.e.nrcan.gc.ca/publications/statistics/parliament05-06/index.cfm?attr=8>.

Obama, Barack. *Remarks of Senator Barack Obama: The American Promise (Democratic Convention)*. Denver, CO: 28 August 2008, http://www.barackobama.com/2008/08/28/remarks_of_senator_barack_obam_108.php.

"Petroleum Navigator." Energy Information Administration. (Washington, D.C.), <http://tonto.eia.doe.gov/dnav/pet/hist/rwtcM.htm>.

Statistics Canada. The Daily. "Canadian International Merchandise Trade." 12 August 2008, <http://www.statcan.gc.ca/daily-quotidien/080812/dq080812a-eng.htm>.

The Canadian International Council (CIC) is a non-partisan, nationwide council established to strengthen Canada's role in international affairs. With local branches nationwide, the CIC seeks to advance research, discussion and debate on international issues by supporting a Canadian foreign policy network that crosses academic disciplines, policy areas and economic sectors.

The CIC features a privately funded fellowship program and a network of issue-specific Working Groups. The goal of the CIC Working Groups is to identify major issues and challenges in their respective areas of study and to suggest and outline the best possible solutions to Canada's strategic foreign policy position on those issues. The CIC aims to generate high end, empirically valid research and impactful foreign policy advice on each issue that are grounded in scholarship.

CIC BOARD OF DIRECTORS

Chair

Jim Balsillie, *Co-CEO, Research In Motion*

Co-vice Chairs

Bill Graham, *Chancellor of Trinity College and Chair, Atlantic Council of Canada*

John MacNaughton, *Chair of the Board, Business Development Bank of Canada*

Executive Vice-Chair

Hugh Segal, *Former President, Institute for Research on Public Policy (IRPP)*

Directors

Scott Burk, *President, Wealhouse Capital Management*

André Desmarais, *President and Co-CEO, Power Corporation of Canada*

John English, *Executive Director, Centre for International Governance Innovation*

Brian Flemming, *Member, Halifax Branch, Canadian International Council*

Edward Goldenberg, *Partner, Bennett Jones LLP*

Douglas Goold, *President, Canadian International Council*

Pierre Marc Johnson, *Senior Counsel, Heenan Blaikie LLP*

Don Macnamara, *President, Victoria Branch, Canadian International Council*

Indira Samarasekera, *President, University of Alberta*

Janice Stein, *Director, Munk Centre for International Studies*

Jodi White, *President, Public Policy Forum*

45 Willcocks Street, Box 210
Toronto Ontario M5S 1C7
TEL: 416-977-9000, 1-800-668-2442
FAX: 416-946-7319