THE PROVINCE OF BRITISH COLUMBIA'S PERSPECTIVE ON THE FEDERAL MORATORIUM ON OIL AND GAS ACTIVITIES, OFFSHORE BRITISH COLUMBIA

Jacques Whitford Environment Ltd. Report (2001)

"The evidence, from a relatively extensive review of conditions off British Columbia in comparison with other oil and gas areas worldwide and the latest engineering technology that applies to development, indicates that there are no unique fatal flaw issues that would rule out exploration and development activities."

Strong et al. Report (2002)

"There is no inherent or fundamental inadequacy of the science or technology, properly applied in an appropriate regulatory framework, to justify retention of the BC moratorium."

The Royal Society of Canada Report (2004)

"Provided an adequate regulatory regime is put in place, there are no science gaps that need to be filled before lifting the moratoria on oil and gas development."

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INTRODUCTION AND SUMMARY

This submission presents the Province of British Columbia's (the Province's) perspective on the federal moratorium on oil and gas exploration and development in the BC offshore. It is the Province's view that the decision on whether to lift the moratorium is a matter of policy rather than of science. As such, the decision requires weighing the public risks and benefits of lifting the moratorium.

The Province considers that the potential public benefits from an offshore oil and gas industry are too great to ignore. Initial estimates suggest that there may be significant hydrocarbon resources off the BC Coast, with the Queen Charlotte Basin alone showing roughly the same potential as Newfoundland's Jeanne d'Arc Basin (home to the Hibernia and Terra Nova fields). Supply and demand forecasts indicate a clear need for new oil and gas resources, notwithstanding the growth in clean energy. Offshore activity could generate major public benefits, including government revenues to support vital public services, increased energy security, unique partnership opportunities with First Nations, and prospects for local jobs, training, business development and investment.

At the same time, a variety of potential risks have been identified for offshore exploration and development. These include the effect of seismic activity on marine life, impacts on local and traditional lifestyles and effect on ecosystems. The question for public policymakers is whether enough is known about the potential risks versus the potential benefits to lift the federal moratorium and proceed with offshore exploration activity.

Over the past 20 years, a number of scientific studies sponsored by the governments of British Columbia and Canada have concluded that there is no scientific justification for maintaining the federal moratorium. The most recent of these by the Royal Society of Canada found that "provided an adequate regulatory regime is put in place, there are no science gaps that need to be filled before lifting the moratoria on oil and gas development."

Based on these reviews and an internal assessment of the potential risks and benefits, the Province recommends removal of the moratorium to enable the gathering of information to better define offshore resources, assess the resource potential, evaluate environmental risks, and develop appropriate measures for managing these risks.

This submission concludes with a description of the Province's comprehensive plan to ensure scientifically sound and environmentally responsible offshore oil and gas activity. The plan focuses on: (1) working with First Nations, coastal communities and key stakeholders to identify their concerns and work together on mutually agreeable solutions; (2) developing options for a comprehensive management and regulatory regime; and (3) working with the federal government to advance scientific knowledge on the BC offshore, and make that knowledge more accessible to the public.

THE CONTEXT FOR BC OFFSHORE OIL AND GAS

This section provides some context for offshore exploration and development in terms of the need to define potential hydrocarbon resources, recent history related to the BC offshore, and the outlook for energy demand and supply at the global, continental and provincial levels.

The Importance of Defining the Resource Potential

Estimates of hydrocarbon potential suggest that significant resources of oil and natural gas may lie off British Columbia's coast.

There are four BC offshore basins (Queen Charlotte, Winona, Tofino and Georgia) that constitute one of three major areas of hydrocarbon potential found along the West Coast of North America. These basins share similar geological conditions and characteristics to the California offshore, which has been producing since 1885, and Alaska's Cook Inlet in production since 1963.¹

The Geological Survey of Canada (GSC) has estimated that the Queen Charlotte Basin could contain an average 25.9 trillion cubic feet (Tcf) of natural gas and 9.8 billion barrels of oil (bbl).² Based on these median estimates of resource potential, probabilities of the hydrocarbon resource achieving its potential, and expected recovery rates for natural gas and oil, the basin could be expected to produce about 9.8 Tcf of natural gas and 1.3 bbl.³ (This natural gas volume, for example, is enough to heat all Canadian homes for about 25 years at current consumption levels.⁴) Given a price of US\$5 per thousand cubic feet for natural gas and US\$30 per barrel for oil, the total volumes would have Canadian dollar values of \$60 billion and \$50 billion, respectively.

More work must be done on defining oil and gas resources and their specific location to assess both the opportunities and risks associated with offshore activity.

By definition, the above estimates reflect only the potential for hydrocarbon recovery; in practice, the commercially viable production volumes could be significantly greater or lesser. Moreover, the limited amount of seismic surveying and other exploration activity to date means that it has not been possible to refine the estimates of total potential, or to more precisely identify specific areas where resources may be found. Additional work must take place to clarify the hydrocarbon resources and their geographic distribution.

Until the nature and location of offshore resources is known, the economic opportunities from development and production cannot be evaluated. Further, the environmental risks of offshore activity cannot be properly assessed, and measures for mitigating them determined, without this important information. For example, in order for oil spill drift

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¹ Rintoul (1990), p. 97, and The Royal Society of Canada (2004), p. 107.

² Hannigan et al. (2001).

³ See The Royal Society of Canada (2004), p. 14 for an explanation of these estimates and their underlying assumptions.

⁴ BC Ministry of Energy and Mines (2004).

modeling to be worthwhile, it is necessary to know whether there is indeed offshore oil present (i.e., as opposed to natural gas alone), what the size of the resource is, and where it exists relative to other marine and coastal resources.

History of the BC Offshore

Industry and government interest in the potential hydrocarbon resources in the BC offshore dates back a number of decades.

Appendix A provides a chronology of key offshore-related activities in British Columbia. The following are some summary points that emerge from a review of this history:

- Industry interest in the BC offshore potential has remained consistent, especially since the 1960s. Two major periods of interest occurred in: (1) the 1960s, when a drill rig was constructed in Victoria and Shell Canada drilled 14 offshore wells; and (2) the 1980s, as oil prices rose and the federal government signed the Atlantic Accords with Nova Scotia and Newfoundland and Labrador.
- Government interest in the BC offshore has "waxed and waned", with the establishment of moratoria first by the federal government in the early 1970s and later by the Province in the early 1980s, in both cases responding to public concerns about oil pollution.
- The moratoria effectively stopped commercial exploration activity, although academic and government research (e.g., GSC seismic surveys to estimate the resource potential, environmental and socio-economic studies) continued.⁵
- While British Columbia has developed significant expertise in marine and ocean services, the lack of commercial offshore activity has affected the growth potential for this services industry. In addition, the West Coast has not enjoyed the same opportunities to establish research and development and educational linkages as have been cultivated by the Atlantic offshore oil and gas industry.
- The technology for offshore exploration and development has improved markedly during the past few decades, resulting in better engineering and environmental performance.
- Two Supreme Court of Canada decisions settled the ownership of three of the four BC offshore basins: the Georgia Basin belongs to British Columbia, and the Tofino and Winona Basins belong to Canada. Ownership of the Queen Charlotte Basin remains undecided.
- In May 2001, the Province began its current effort to determine whether offshore exploration and development can be carried out in an environmentally and socially responsible manner.

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⁵ For example, largely due to the moratorium, less than 30,000 kilometres of seismic studies have been conducted for the BC offshore, compared to more than 1,350,000 kilometres completed for the Newfoundland and Labrador offshore between 1964 and 2002. LGL Ltd. (2004).

Industry action is waiting on greater regulatory certainty and the ability to explore for and develop offshore oil and gas.

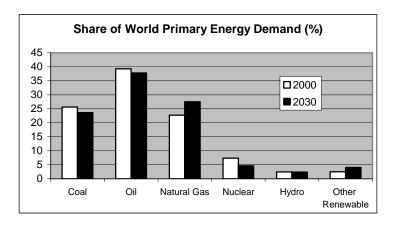
Some question why the oil and gas industry has not been more aggressive in pushing for the development of offshore resources. Several reasons can be cited for industry's reluctance to do so. First, there are unresolved issues with respect to the regulatory regime for offshore oil and gas activity, as well as unresolved First Nations issues. Second, good geological information is an absolute prerequisite for an offshore industry to develop, and progress in gathering this information has been impeded by the federal moratorium.

Moreover, even if exploration is allowed in the BC offshore so that geological data can be gathered, no company will commit to an exploration program without the prospect of being able to develop economically viable resources. Therefore, the moratorium must be lifted for both exploration and production if an offshore industry is to emerge.

Future Demand and Supply

During the next 30 years, most of the world's energy demand will continue to be met by hydrocarbons, with oil and natural gas remaining predominant.

According to the International Energy Agency's (IEA's) 2002 forecast, global primary energy demand will grow at an average annual rate of 1.7% between 2000 and 2030, compared to 2.1% over the past three decades. More than 60% of the total increase in demand is expected to come from developing countries, in particular China, India and other parts of Asia. Among end uses, transportation and electricity generation will drive the growth in energy requirements in both the developed and developing world. Not surprisingly, therefore, hydrocarbons will remain the primary sources of energy, accounting for around 90% of demand growth and about the same share of total requirements in 2030. Of these fuels, natural gas will grow the fastest, doubling its consumption over the period, and oil and natural gas together will be a projected 70% of global energy demand by 2030.



Oil and natural gas are expected to account for the largest shares of world energy in the next 30 years (IEA 2002).

⁶ IEA (2002).

There are mutual benefits in developing oil and gas resources for the continental energy market, to ensure security of supply and maintain economic competitiveness.

North American energy demand is dominated by the United States, which depends on imports for more than half of its oil (15% of which comes from Canada) and 15% of its natural gas (primarily from Canada). ⁷ Total US energy demand is expected to grow by 1.5% annually over the next twenty years, driven like the rest of the world by transportation and electricity requirements. ⁸ To meet rising natural gas consumption, the US Energy Information Administration projects greater reliance on more costly supplies, including liquefied natural gas and remote sources such as Alaska and the Mackenzie Delta (pending the completion of northern natural gas pipelines). ⁹

Canadian energy needs are forecast to rise at an average rate of 1.4% annually through 2025, with an increased emphasis on natural gas. ¹⁰ Canada currently exports over 60% of its oil production and half of its natural gas production to US markets. At the same time, crude oil is imported from overseas to satisfy more than half of domestic refinery requirements. Canada will face growing pressure to find economical hydrocarbon resources, as both a domestic supplier and an exporter. Without continuing access to cost-effective oil and natural gas imports, the US economy will be negatively affected, which in turn will have an impact on the export-oriented Canadian economy.

British Columbia must seek new sources of energy, to meet growing provincial demand and take advantage of export opportunities.

British Columbia is a net exporter of energy, and produces more primary energy than any other province except Alberta. In the Western Canada Sedimentary Basin, Alberta has been experiencing declining reserves of conventional natural gas, while British Columbia is currently adding more to reserves than are being removed by production (for a 111% replacement rate). Given growth in North American demand and the maturity of Alberta conventional hydrocarbon development, there are considerable opportunities for BC producers to supply domestic and export markets. Further, while northeastern British Columbia accounts for a major share of hydrocarbon reserves and undiscovered potential, its projected growth will not be sufficient to meet future domestic and export needs. In the case of oil, British Columbia currently produces approximately 14 million barrels and imports about 41 million barrels annually.

Our offshore basins are a potentially significant energy source that could be developed to serve the domestic market.

The Queen Charlotte Basin alone is roughly equivalent in resource potential to Newfoundland's Jeanne d'Arc Basin, where the Hibernia and Terra Nova fields are

⁹ Ibid.

⁷ Energy Information Administration (2004).

⁸ Ibid.

¹⁰ National Energy Board (2003). The average annual growth rate in energy demand for 2000 through 2025 is based on the "Supply Push" scenario.

producing and the White Rose field is being developed.¹¹ The Province believes that developing British Columbia's offshore hydrocarbon resources is important to the domestic energy market on the basis of potential oil and gas production capability, energy security, and proximity to demand. By continuing to develop its hydrocarbon resources, British Columbia not only earns the royalties and other revenues, but also takes advantage of economies of scale and reduced distribution costs to help keep down the cost of provincial energy supply.

For the longer term, onshore and offshore natural gas resources can support the transition to a sustainable renewables-based energy future.

Globally and provincially, the use of clean, alternative energy resources is rising but is not expected to reach a major share of total energy supply for a number of decades. In the case of world energy demand, the IEA expects non-hydro renewables to grow the fastest of all energy resources – at 3.3% annually over the next 30 years – but these renewables will still only account for a projected 4% of total demand by 2030. 12

Alternative energy experts themselves acknowledge the lengthy timeframe required to develop this market share, for example:

Michael Moore, Chief Economist of the US National Renewable Energy Laboratories – "In the future – 40 to 50 years out, as opposed to 10 years out – renewables will probably have a greater effect in stabilizing a corner of the market, probably about 25 percent." ¹³

Geoffrey Ballard, Chairman, General Hydrogen Corporation – "Although it is of great interest to society to reduce the amount of oil burned in internal combustion engines, studies of the advent of fuel cell cars, even using a very aggressive scenario, indicate that the use of oil will continue to increase for the next 30 years. After the gradual decline of oil for transportation, there will be a healthy demand for oil as a petrochemical feedstock." ¹⁴

It is widely acknowledged that natural gas will provide the transition fuel to a renewables-based economy – powered with hydrogen and renewable energy – whose arrival date is uncertain, but could be in the range of 25 to 50 years. Today, almost all of the world's hydrogen is produced from hydrocarbons, and developing applications of hydrogen fuel cells (e.g., in vehicles, laptops, backup generators) are largely reliant on natural gas, or its liquid carrier methanol, for their hydrogen feedstock.¹⁵

Revenues from offshore oil and gas could be used to support the transition to a renewables-based economy, either directly through the concept of a legacy fund to

¹³ "Alternative energy still blowing in the wind", Vancouver Sun, March 11, 2004.

¹¹ The Royal Society of Canada (2004), p. 14.

¹² IEA (2002).

¹⁴ Ballard (2003).

¹⁵ IEA (2003).

facilitate investment in alternative energy, or indirectly through the Province's improved fiscal capacity.

PROVINCIAL POLICY DIRECTION

Lifting the federal moratorium would support major provincial policy initiatives and provide British Columbia with the opportunities available to other Canadian jurisdictions in exploring for and developing offshore resources.

The Province has set a clear policy direction for the responsible development of BC offshore oil and gas resources in four successive Throne Speeches:

July 2001: "An independent scientific review panel will be appointed to address the hard questions that must be answered before we can consider realizing this [offshore oil and gas] potential. It will ascertain whether those resources can, in fact, be extracted in a way that is scientifically sound and environmentally responsible, with its initial findings being tabled by January 31, 2002." 16

February 2002: "Last October, my government appointed an independent Scientific Panel to assist in determining whether offshore oil and gas exploration could be conducted in a manner that is scientifically sound and environmentally responsible. My government will move with caution to ensure that any activity taken in this regard will always be guided by sound science and an unswerving commitment to responsible environmental protection. Yet it also wants Northerners to know that they too can look forward to the future with hope and optimism from the opportunities that might flow from the development of our offshore oil and gas deposits."¹⁷

February 2003: "Offshore oil and gas exploration holds tremendous promise for communities in the Northwest and on northern Vancouver Island. By 2010, your government wants to have an offshore oil and gas industry that is up and running, environmentally sound, and booming with job creation." ¹⁸

February 2004: "There is an estimated 42 trillion cubic feet of gas and 9.8 billion barrels of oil off our northern coast and the coast of Vancouver Island. Your government will encourage the government of Canada to complete its scientific review and join with B.C. in responding to this truly exceptional offshore oil and gas opportunity with actions that are scientifically sound, environmentally safe and socially responsible." ¹⁹

The BC Energy Plan strongly supports this provincial public policy direction.

In November 2002, the Province released *Energy for our Future: A Plan for BC*, outlining a series of actions to help revitalize the provincial economy through responsible

¹⁶ Speech from the Throne, 2nd Session, 37th Parliament.

 $^{^{17}}$ Speech from the Throne, $3^{\rm rd}$ Session, $37^{\rm th}$ Parliament.

¹⁸ Speech from the Throne, 4th Session, 37th Parliament.

¹⁹ Speech from the Throne, 5th Session, 37th Parliament.

energy development and use.²⁰ One of the plan's four cornerstones is a secure and reliable supply of energy. In support of this goal, Policy Action #11 committed the Ministry of Energy and Mines to establishing "a dedicated provincial offshore oil and gas team to develop a provincial position, work with the federal government and move effectively toward the development of offshore resources". It also acknowledged that before offshore development could proceed, the provincial and federal governments would have to agree on a management regime, and the Province would have to work with coastal communities and First Nations on ensuring local benefits.

The Energy Plan's fourth cornerstone of environmental responsibility and no nuclear power sources involves action on a number of fronts. To encourage alternative energy, the Province has established Canada's first clean energy goal to acquire 50 percent of new electricity supply over the next ten years from clean sources such as small hydro, wind and solar power, and biomass energy. Energy efficiency will be promoted through measures that include new rate structures for large power consumers. However, even with more aggressive energy efficiency programs and alternative energy development for the coming decade, the unavoidable conclusion is that British Columbia will need new energy sources to meet growing provincial demand, including natural gas and oil.

Offshore exploration and development is also part of the Province's Heartlands Economic Strategy.

The BC Heartlands Economic Strategy is aimed at revitalizing regional resource-based economies that have lagged behind the metropolitan southwest economy. A recent document on the strategy profiled the economic opportunities from offshore oil and gas for communities in the Northwest and on Vancouver Island. It cited the work being done by the British Columbia Offshore Oil and Gas Team (established in January 2003) to gather information from coastal communities, First Nations, and other stakeholders and jurisdictions, as well as the research on scientific and socioeconomic issues undertaken by the University of Northern British Columbia (UNBC). Partnerships with First Nations are emphasized under the strategy.

The Heartlands Economic Strategy is concerned with creating opportunities outside the Lower Mainland. Removing the federal moratorium could result in activity that contributes to the revitalization of coastal communities, the diversification of the BC economy, and the generation of revenues to help maintain provincial health and educational systems.

The Province believes that the Government of Canada should view British Columbia's offshore resources on a consistent basis with other parts of the country.

Offshore oil and gas activity already occurs in the fragile waters of the Beaufort Sea, off the Atlantic Coast, and in the Great Lakes. The Province sees no reason why this activity should not be considered for the Pacific Ocean.

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²⁰ Province of British Columbia (2002).

²¹ Province of British Columbia (2003).

POTENTIAL BENEFITS OF OFFSHORE OIL AND GAS ACTIVITY

The prospect of economic and social opportunities is the public policy basis for the Province's interest in proceeding with offshore exploration and development.

An offshore oil and gas industry could bring significant public benefits.

As described above under the outlook for energy supply and demand, hydrocarbons and their economic opportunities will remain important to British Columbia for the foreseeable future. In support of boosting development in the Heartlands and diversifying the provincial economy, there are considerable benefits that could arise from lifting the federal moratorium, should commercial reserves be identified. These would include:

- government revenue to support health care, education and other vital public services;
- contribution to energy self-sufficiency and security of supply;
- unique partnership opportunities with First Nations;
- jobs and training in the energy, ocean/marine and service sectors associated with offshore development;
- local and provincial business opportunities in supply and service industries (e.g., transportation, catering, hospitality and janitorial services);
- expansion of British Columbia's research and development and educational capacity;
- growth in energy and technology intensive industries (e.g., petroleum refining, petrochemicals, advanced robotics, engineering);
- investments in ports, airports, shipping, pipelines, telecommunications and other infrastructure;
- increased exports of goods and services; and
- indirect and induced benefits, e.g., from spending by offshore-related businesses and workers.

While it is difficult to compare the experience elsewhere with what might happen in British Columbia, other jurisdictions demonstrate the kinds of economic benefits that can be achieved from offshore exploration and development, for example:

- The petroleum industry (mostly offshore production) is Alaska's largest non-governmental industry, accounting for 20% of all private sector payroll in the state and generating more than 33,500 jobs.²²
- From 1999 to 2002, the Newfoundland and Labrador economy experienced a 15% increase in gross domestic product and an average 13,900 more jobs annually than would have occurred without the offshore oil and gas industry.²³

²² Alaska Oil and Gas Association (2001).

²³ Community Resource Services Ltd. (2003).

• On the Atlantic Coast, it is estimated that between one-third and two-thirds of the dollars spent on offshore activity flow directly into regional and local economies in the form of wages, purchases of goods and services, and taxes.²⁴

There have been repeated observations made that the North American Free Trade Agreement (NAFTA) would restrict British Columbia's ability to capture economic benefits from offshore exploration and development. In fact, NAFTA includes provisions that would allow a jurisdiction to provide "full and fair opportunity" to domestic workers and businesses. More importantly, however, our existing marine/ocean sector, which now exports services worldwide, offers a base for securing a share of the economic opportunities. The long-term success of BC industry and workers will depend on their competitiveness vis-à-vis other jurisdictions.

A comprehensive education and training strategy is needed, along with an industrial development strategy, to determine how best to position the BC workforce and companies to capture and retain the benefits of offshore oil and gas activity.

Unique partnership opportunities could be pursued with First Nations.

The Province recognizes that it must meet its obligations regarding First Nations rights and interests. Accordingly, it is engaged with the federal government in the tripartite treaty process to address unresolved land claims. Progress is being made, with five Agreements-in-Principle approved and negotiations advancing toward final agreement. Despite the complexity of these negotiations and conflicts that arise, all parties understand that provincial economic activity, including offshore oil and gas exploration, cannot be brought to a halt until claims are resolved.

At the same time, it is clear that First Nations, governments and industry all require a degree of certainty before exploration and development proceeds. The Province is optimistic that this requirement can be satisfied through partnership arrangements.

The offshore provides a unique opportunity to work collaboratively with First Nations on every phase of the development cycle. The Province believes that this can best be done outside the forum for addressing issues of aboriginal right and title. The range of policy options is wide and includes benefits sharing and participation in the regulatory regime. Thus, while progress continues on the settlement of land claims, offshore oil and gas offers the chance to formulate new economic arrangements with First Nations.

Offshore oil and gas activity could help restore the economic and social wellbeing of coastal communities.

Recently, British Columbia's coastal communities have been reeling under the effect of downturns in resource sectors such as forestry and fishing. When coastal communities flourish, large urban centres also benefit. Today, coastal regions still rely to a major extent on forestry, mining and fishing, with a combined income dependency ranging from

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²⁴ Canadian Centre for Energy Information (2004).

²⁵ For example, Vancouver-based Sandwell Engineering Inc. is an exporter of marine engineering services, currently involved in offshore activity in Eastern Russia.

20% to 54%.²⁶ Despite the positive contribution of growing sectors like tourism and aquaculture in some local economies, it is clear that new economic drivers will be necessary to secure the long-term economic future of the coast.²⁷

Although the link between local economic prosperity and community health is difficult to quantify, coastal communities are obviously suffering and need opportunities that flow from resources "in their backyard".²⁸

OFFSHORE SCIENCE – ENVIRONMENTAL RISKS AND HYDROCARBON RESOURCES

The Province recognizes that potential impacts on the environment and cultural values are another important public policy dimension of offshore oil and gas activity.

A variety of concerns have been expressed about the environmental risks posed by offshore exploration and development.

These risks range from the effect of seismic surveys on marine life, to the discharge of drilling muds and other potentially harmful substances, to impacts on fisheries and First Nations traditional values. The Province acknowledges these risks and the need to assess and mitigate them during the process of offshore exploration and development.

Throughout the federal moratorium, a series of scientific studies have been completed with respect to the BC offshore:

- 1984-6: Canada and British Columbia appointed the West Coast Offshore Exploration Environmental Assessment Panel to conduct a public review of the environmental and socio-economic effects of offshore exploration. After extensive hearings, a report was issued concluding that environmentally responsible exploration could proceed, subject to 92 terms, conditions and recommendations for offshore oil and gas activity.
- 1988: The GSC conducted some 1,200 kilometres of seismic surveys in the Queen Charlotte Basin, contributing to its 2001 report providing the most recent estimate of the BC offshore potential, as reported earlier. Interestingly, this seismic work also discovered the glass sponge reefs in Hecate Strait.

²⁶ Horne (2004). The regions covered by this range are the North Coast, North Vancouver Island, Central Coast, and the West Coast of Vancouver Island.

²⁷ This is also true for many parts of Western Canada. According to the Conference Board of Canada (2003), "there is little doubt that unless Western Canada diversifies its economic structure and develops higher value added goods and services, the region's economic growth and incomes will fall behind not only those of the rest of Canada but also the rest of the industrialized world."

²⁸ The 2001 Census found that all coastal regional districts were within the province's bottom ten for population growth, showing net declines of 20% (Skeena-Queen Charlotte) to over 40% (Central Coast and Kitimat-Stikine). Among municipalities, Prince Rupert, Terrace, Kitimat, Masset and Port Alice were all in the bottom ten for their municipal category.

²⁹ West Coast Offshore Exploration Environmental Assessment Panel (1986).

³⁰ Hannigan et al. (2001).

- 1993: SPARK (Strategic Planning for Applied Research and Knowledge) produced a report for the Science Council of BC on the potential economic and technological opportunities from ocean-related activities, including offshore oil and gas development.³¹ It concluded that offshore development could provide significant economic opportunities, but also noted that the lack of geophysical information limited assessment of the potential resource.
- 1996: The Province commissioned the Canadian Oceans Frontiers Research Foundation to review the recommendations of the 1986 Environmental Assessment Panel in light of new technology and science.³² The review concluded that many Panel concerns had been addressed through technological advances and government research programs and that, while more work was required, there had been significant development of new tools and databases.
- 1998: The BC Information, Science and Technology Agency contracted AGRA Earth and Environmental Limited to provide a further update on the 1986 recommendations.³³ The AGRA study found that industry and regulators had made substantial advancements to minimize risks associated with the offshore petroleum industry in Atlantic Canada, Norway and the United Kingdom.
- 2001: The Province commissioned Jacques Whitford Environment Limited to update the 1998 AGRA study.³⁴ The key conclusion of the *British Columbia* Offshore Oil and Gas Technology Update (the "Jacques Whitford Environment Ltd. Report") is noted below.
- 2001-2: A three-person independent Science Review Panel was appointed by the Province to advise on whether offshore oil and gas activity could be undertaken in a scientifically sound and environmentally responsible manner (see the key conclusion of the "Strong et al. Report" below).³⁵
- 2002: The Province provided a \$2 million grant to UNBC to support scientific and technical research consistent with the Science Review Panel recommendations. Four research projects were subsequently funded that are undergoing peer review.
- 2003-4: The federal government commissioned The Royal Society of Canada to complete a review of science issues arising from potential offshore oil and gas activity, and to identify science gaps needing to be filled before or after any decision on lifting the moratorium (see its key conclusion below).³⁶

³¹ SPARK OCEANS Committee (1993).

³² Canadian Oceans Frontiers Research Foundation (1996).

³³ AGRA Earth and Environmental Limited (1998).

³⁴ Jacques Whitford Environment Ltd. (2001).

³⁵ Strong et al. (2002).

³⁶ The Royal Society of Canada (2004).

None of these reviews found a scientific justification to maintain a blanket moratorium over all BC offshore exploration and development, for example:

Jacques Whitford Environment Ltd. Report – "The evidence, from a relatively extensive review of conditions off British Columbia in comparison with other oil and gas areas worldwide and the latest engineering technology that applies to development, indicates that there are no unique fatal flaw issues that would rule out exploration and development activities."

Strong et al. Report – "There is no inherent or fundamental inadequacy of the science or technology, properly applied in an appropriate regulatory framework, to justify retention of the BC moratorium."

The Royal Society of Canada Report – "Provided an adequate regulatory regime is put in place, there are no science gaps that need to be filled before lifting the moratoria on oil and gas development."

The reviews identified gaps in science and knowledge, but none of these gaps need to be filled before lifting the federal moratorium.

All three of the reports cited above identified gaps or areas where scientific knowledge should be improved to better assess the potential impacts of offshore oil and gas activities. The Strong et al. Report and the Royal Society of Canada Report found that the moratorium was, in fact, a major reason for many of the knowledge gaps, and that its removal would increase the opportunities to fill them.

The appropriate parties can fill the information gaps as oil and gas activity proceeds, with the help of research results from other jurisdictions.

The gaps in scientific and technical information arise at different stages of the offshore exploration and development process. Some issues may never come up if development does not go ahead, or if it does not raise a specific environmental risk.

Information gaps can be filled when particular decisions must be made with respect to exploration and development activities. In the meantime, research is being conducted on the East Coast and elsewhere, including extensive analysis funded by the Environmental Studies Research Board. For example, there are currently over \$900,000 of studies being conducted in Canada on the impact of seismic surveys on marine life that can provide useful information for British Columbia's needs.³⁷

The responsibility for undertaking research falls on both governments and industry, paid for by the party who is the prime beneficiary of the information. In some cases, public-private partnerships could be the best way to fill specific information gaps. Local and traditional knowledge is also important and should be taken into account.

 $^{^{\}rm 37}$ Environmental Studies Research Board (2003).

Lifting of the moratorium in itself would not create environmental impacts.

Removal of the federal moratorium would have no direct or immediate environmental (or socio-economic) impact. It would simply reopen the possibility for industry to invest in offshore exploration and development. Before that occurs, a number of steps would be required, including the establishment of a regulatory regime; the resumption of negotiations for a Pacific Accord between British Columbia and Canada; the negotiation of mechanisms for First Nations participation in future decision-making and economic opportunities; and additional environmental assessments and regulatory scrutiny of specific project proposals. Through these various steps and safeguards, activities that could be conducted in a safe and environmentally responsible manner would go ahead.

Experience elsewhere has shown that with proper regulatory practices, the environmental effects of offshore activity can be managed and minimized.

To illustrate, Cook Inlet in Alaska has been an area of active oil and gas exploration and production since 1957. In 1998, the Alaska Oil and Gas Association noted that:

"Forty years of scientific studies, as well as continuous monitoring by government agencies and by the Cook Inlet Regional Citizens Advisory Council, show no adverse effects on Cook Inlet, whose water support healthy sport and commercial fisheries. Even Greenpeace, which conducted a study near the Trading Bay Production Facility, found no evidence of industry related contamination."

"In short, there has been no documented evidence of any long-term degradation to the environment from more than 40 years of industry activity in Cook Inlet." ³⁸

An effective and efficient regulatory regime is essential to ensuring the adoption of best management practices in British Columbia.

Both the Strong et al. and Royal Society of Canada reports emphasized that the existence of an effective regulatory regime was critical to their conclusion of no scientific or technical rationale for maintaining the moratorium on offshore oil and gas activity. The Province agrees with this emphasis, and recognizes that such a regime is a necessary step in providing the public with confidence that offshore activities will be conducted in a scientifically sound and environmental responsible manner. In developing a BC offshore regime, the parties will be able to draw upon models and approaches from around the world, providing a unique opportunity to choose the best and most effective practices.

The Province concludes that a prudent strategy is to lift the federal moratorium, proceed with better definition of the hydrocarbon resource, assess the resource potential, evaluate the environmental risks and develop appropriate risk management measures.

Removal of the moratorium will allow seismic surveys and other exploration activity to proceed. The result will be improved information on the potential offshore oil and gas resources and where they are located. This, in turn, will allow specific environmental risks to be assessed and appropriate management measures to be developed. For

³⁸ Alaska Oil and Gas Association (1998).

example, these could include the identification of sensitive marine areas where oil and gas development would be prohibited or conditions would be attached to development.

Strategies to fill the information gaps with respect to resource potential and environmental risks, and to develop an appropriate regulatory regime, are part of the Province's overall work plan for offshore oil and gas.

THE PROVINCE'S PLAN

A provincial plan is underway to ensure scientifically sound and environmentally responsible offshore oil and gas activity.

The Province appreciates that lifting of the federal moratorium on BC offshore activity, while crucial, is only the first of a series of steps that must be taken. However, this initial step is clearly required before British Columbia's resource potential can be identified and an industry subsequently developed.

Since the establishment of the Offshore Oil and Gas Team in January 2003, the Province has launched a comprehensive plan to achieve its goal of scientifically sound and environmentally responsible exploration and development. The fundamentals of this plan are set out in the May 2003 *Project Plan of the Offshore Team* (Appendix B).³⁹

The foundation of the Province's Plan is a long-term strategy focusing on the commencement of exploratory activity in 2010, together with a set of basic principles to guide the provincial approach. There are three key themes:

- Working with First Nations, coastal communities and key stakeholders to identify their concerns, provide information and establish mutually agreeable solutions;
- Developing options for the provincial position on a comprehensive management and regulatory regime, encompassing the initial granting of explorations rights through decommissioning of facilities and site cleanup; and
- Working with the federal government to advance the state of scientific knowledge about the BC offshore, and to make that knowledge more accessible to the public.

IMPLEMENTATION OF THE PLAN

The following sets out the principles and next steps for going forward with the Province's Plan:

First Nations, Coastal Communities and Key Stakeholders

It is clear that the issues facing First Nations and all stakeholders in considering the potential benefits and risks of offshore oil and gas activities are complex, and that reliable and objective information must be available for these communities to come to an informed view. To that end, the Province has begun work with First Nations and stakeholders to address these information needs.

³⁹ The Project Plan can also be found on the Offshore Team's website: www.offshoreoilandgas.gov.bc.ca.

First Nations:

There are clearly potential economic development and training opportunities associated with offshore exploration and development. The experience of some First Nations with onshore activity in the Northeast shows that these opportunities can be of considerable benefit when done in partnership with government and industry.

Furthermore, First Nations have unique interests, including legal ones, which must be addressed by government in the course of developing an offshore industry. The Province believes that offshore development provides a novel opportunity to develop new, innovative and effective means of addressing First Nations interests, and is committed to working in collaboration with First Nations to do so.

The Province will continue to work with First Nations in accordance with the following principles:

- First Nations will share in the benefits that accrue from offshore development.
- First Nations will have a role in the management and regulation of offshore development.
- First Nations will be provided with timely, objective and relevant information on the risks and benefits of offshore oil and gas development.
- Offshore exploration and development will occur in a manner that minimizes
 adverse impacts on traditional values and activities, and unavoidable impacts will
 be mitigated to the fullest extent possible.

Coastal Communities and Key Stakeholders:

The Province recognizes that coastal communities, like First Nations, require extensive, factual and relevant information on the potential benefits and risks associated with offshore development. It is also understood that these communities, although keenly interested in the potential benefits from development, are concerned that the benefits will largely be realized by others, and that they will face a disproportionate share of the risks.

In addition, key stakeholders, including the existing tenure holders, have a variety of interests and concerns that must be addressed. These range from tenure holders who wish to ensure a smooth and equitable transition to a new management and regulatory model, to other ocean users (e.g., the fishing, tourism and marine transportation industries) who wish to avoid adverse impacts on their activities, to environmental groups that are concerned with potential environmental impacts.

A key aspect of addressing both coastal community and stakeholder interests is the provision of objective, relevant and timely information on the benefits and risks associated with offshore development.

Next steps will consist of:

 Continue to work with First Nations, coastal communities and key stakeholders to provide relevant information to assist them in identifying their interests and means to address these interests;

- Convene additional workshops with First Nations, coastal communities and key stakeholders to identify existing sources of information on offshore development and to adapt these sources to reflect their views on effective communications and information exchange;
- Begin discussions with First Nations, coastal communities and key stakeholders on management and regulatory approaches, and on First Nation roles in these processes;
- Begin discussions with First Nations on fiscal arrangements that could apply to
 offshore development, including options for First Nation participation in benefit
 sharing;
- Encourage coastal First Nations to establish broad-based organizational structures that would facilitate the development of coast-wide approaches;
- Begin negotiation of agreement-in-principle level understandings with First Nations as to their role in management and regulation and specific measures to ensure that they receive an appropriate share of benefits;
- Continue the development and distribution of educational materials, including providing support to stakeholder and other organizations for the production and delivery of educational and public information sessions;
- Engage coastal communities and stakeholders on the recommendation proposed in the Royal Society of Canada report regarding the establishment of a broad-based advisory group;
- Develop a comprehensive strategy for education and training to assess the best approach for workforce preparation; and
- Prepare an industrial strategy to assess and develop British Columbia's industry capacity to support offshore oil and gas activity.

Management and Regulatory Regime

The Province believes a management and regulatory regime must be comprehensive, dealing with all aspects of offshore exploration and development, including the establishment of fiscal arrangements (e.g., royalties and taxes); initial decisions to open areas for exploration; granting of exploration rights and tenures; environmental assessments of all proposed offshore activities; approval of development plans; establishment and monitoring of operational health, environment and safety requirements; and decommissioning and reclamation.

This regime would be consistent with the following principles:

- An integrated, "single-window", coast-wide regime, with jurisdictional and ownership issues set aside;
- "Go" and "No-go" areas for resource development that are clearly defined, including seasonal provisions and any special rules or requirements;

- Transparent, predictable and effective regulatory rules and requirements, with an emphasis on a results-based, non-prescriptive approach;
- An independent, accountable and objective regulatory agency that is sensitive to advances in technology and science;
- An approach that encourages responsible development of the BC offshore and provides for the Province to be the primary beneficiary and to receive revenues as if the resources were located on provincial land;
- Local community enjoyment of benefits that are commensurate to the risk assumed: and
- Full and prompt compensation for losses by the responsible party.

The various elements of a management and regulatory regime are outlined below, along with their next steps.

Tenure Regime:

A clear and predictable tenure regime is crucial for industry considering investment in the BC offshore. The Province believes that an offshore tenure regime must promote timely and responsible development, and provide certainty to tenure holders. In addition, it will be necessary to design transitional arrangements regarding the existing tenure interests. Next steps will consist of:

- Develop options for a BC offshore tenure regime, including a process for determining when lands will be opened for exploration, and what rules apply to each form of tenure;
- Review tenure options with key stakeholders to obtain feedback;
- Develop final options for transitional arrangements; and
- Review options for transitional arrangements with existing tenure holders.

Fiscal Regime:

A sound, comprehensive fiscal regime should deal with two major issues – determination and collection of revenues, and the distribution of these revenues. Next steps will consist of:

- Develop options for royalties and other revenue generation measures that could apply to the BC offshore;
- Develop options for the distribution of revenues, including consideration of special purpose funds or other targeted expenditures;
- Review fiscal regime options with key stakeholders and the public to obtain feedback; and
- Develop options for the use of other benefit models as an integral part of the overall fiscal regime.

Environmental Assessment:

The Province believes that a critical step to ensuring that exploration and development is conducted in a scientifically sound and environmentally responsible manner is the effective and timely assessment of proposed activities. This assessment must be tailored to the specific circumstance of the offshore activity and done in an integrated and coordinated fashion to avoid needless duplication of effort and expense.

From the Province's perspective, the environmental assessment process must address the full scope of offshore oil and gas activities. The process must have clear rules as to the nature of the assessment required for each activity, whether initial screening, comprehensive study or public hearings. The assessment must include consideration of how to ensure that offshore oil and gas activities co-exist with other ocean users.

Next steps will consist of:

- Develop options for environmental assessment process that could apply to the BC offshore:
- Review environmental assessment options with key stakeholders, including the public, to obtain feedback; and
- Continue to participate in the Atlantic Roundtable process.

Regulatory Agency:

The Province believes that BC offshore activities should be governed by a single, independent agency, with regulatory rules that are clear, predictable and effective in balancing regulatory effectiveness with operational practicality. Establishing objective, understandable and robust regulatory rules and conditions is an essential element of a sound regulatory regime. In particular, regulations must have clear timelines and decision-making processes and rules, to avoid inconsistency and delay.

Regulatory uncertainty can also arise when the proponent of a particular activity is required to obtain approvals from a wide array of agencies, frequently with differing requirements and priorities. Meeting these overlapping and often duplicating rules is time-consuming and expensive, and can lead to inconsistent or conflicting outcomes for a single activity. Duplication not only arises between federal and provincial governments, but also within each government where two ore more agencies may claim authority over a particular activity.

The Province believes that the most effective and efficient means of addressing this issue is to provide the regulatory agency with a mandate to address all proposed exploration and development activities through comprehensive "single-window" authority. British Columbia has established a one-window model for onshore oil and gas activity in the BC Oil and Gas Commission (OGC), and the success of this model is widely cited as a key reason for the recent expansion in industry activity. While the OGC itself is not suited to regulation of the offshore, it demonstrates the effectiveness of a true one-window agency.

Next steps will consist of:

• Develop options for a regulatory agency that could apply to the BC offshore; and

• Review regulatory agency options with key stakeholders and the public to obtain feedback.

Federal-Provincial Coordination on Science

Although the Province considers that the existing science gaps do not warrant continuation of the federal moratorium, it is also recognized that the state of scientific knowledge on the BC offshore can and should be improved. As noted by the Royal Society of Canada Report, the responsibility for undertaking or funding the research should fall to the party – government or industry – that stands to benefit from the information. Where both would benefit, then the responsibility should be shared. Further, the scope and timing of necessary work will depend on the nature of exploration or development activity being contemplated.

Determining what scientific work should be done when, and who should pay for it, cannot be accomplished by the Province alone. The full and active participation of the federal government, industry, First Nations, stakeholders and the academic community is required.

The Province believes that science has a critical role to play in the process of identifying sensitive marine areas that should be protected from some or all offshore exploration and development activities, and the specific type and scope of protection afforded particular areas. We agree with the conclusion of the Royal Society of Canada Report that marine protected areas, and the rules governing them, should be established as soon as practicable. Achieving this goal will require a coordinated approach among the federal government, the Province and First Nations. The Province is currently in discussions with the federal government over a collaborative process to implement an Oceans Strategy, including establishing common marine protected areas.

An important science gap is the limited knowledge concerning the potential hydrocarbon resource itself, including its size, location and recoverability.

Next steps will consist of:

- Develop a comprehensive, staged approach to addressing gaps in scientific knowledge that recognizes that the principal beneficiary should assume responsibility for the research;
- Develop options for a multi-disciplinary scientific advisory committee to advise government and industry;
- Continue targeted support to universities and other institutions to undertake specific research projects as required;
- Continue the development of educational materials designed to provide plain language descriptions of important offshore scientific questions and issues;
- Develop options for undertaking seismic studies to better assess oil and gas potential;
- Continue to work with Canada through the Ocean Strategy and related BC Canada Marine Protected Areas Strategy to determine what areas should be protected, and the nature and scope of that protection.

CONCLUSION

The question of lifting the moratorium on offshore oil and gas activity is clearly not one of science, but rather one of public policy. All scientific studies commissioned by both the federal and provincial governments in the last three years have made this clear. The Province of British Columbia believes that the potential opportunities provided by offshore oil and gas development are of significant public value.

Development of BC offshore oil and gas holds tremendous potential to add to government revenues that support health care, education, and other vital public services; contribute to energy self-sufficiency and security; provide unique partnership opportunities with First Nations, and generate prospects for jobs and training and businesses and investment.

The federal policy with respect to the British Columbia offshore should be consistent with other parts of Canada. Lifting of the moratorium will facilitate the effective resolution of knowledge gaps, will allow British Columbia, Canada, First Nations and coastal communities to collaboratively pursue common interests around offshore development, and will provide industry with an appropriate environment for responsible development.

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APPENDIX A: A CHRONOLOGY OF OFFSHORE OIL AND GAS ACTIVITY IN BRITISH COLUMBIA

1913

BC Coal Co. drills a shallow exploratory well on Graham Island because of the presence of natural oil seeps. The well produces some natural gas, but no oil.

1949

Drilling for oil occurs in the Queen Charlotte Island region.

1959

British Columbia declares a Crown reserve over oil and gas resources in the area east of a line running north-south three miles seaward of the Queen Charlotte Islands and Vancouver Island. Under the *Petroleum and Natural Gas Act*, exploration permits over oil and gas in a Crown reserve can only be granted through public auction.

1962-1966

The British Columbia Crown reserve over offshore oil and gas resources is cancelled to encourage companies to apply for exploration permits.

1966

British Columbia reinstates the Crown reserve over offshore oil and gas resources to the area beginning at the low-water mark seaward to the outer limits of Canada's Territorial Sea, and to that area of the Continental Shelf capable of being exploited.

1966-69

Canada withholds exploration approval in the Strait of Georgia until a federal-private study on the effects of seismic exploration on fish stocks is complete.

1967

British Columbia declares a Crown reserve over offshore mineral and placer minerals in the same area as the offshore oil and gas Crown reserve.

The Supreme Court of Canada decides that the Territorial Sea off British Columbia, outside of bays, harbours and inland waters, belongs to Canada.

Shell Canada begins a drilling program off Barkley Sound on Vancouver Island. Over the next two years, 14 offshore wells are drilled in the region from Barkley Sound north through Queen Charlotte Sound and Hecate Strait.

During the exploration program, the drilling rig built in Victoria reportedly experiences seas of 80 feet and winds of 70 miles per hour off Vancouver Island, and seas of 65 feet (with one rogue wave of approximately 100 feet) in Hecate

Strait. Non-commercial levels of oil are found off the Queen Charlotte Islands and some natural gas shows are found off Tofino.

1969

Shell Canada leases its exploration rights to Chevron.

In Santa Barbara, an offshore rig experiences a blowout. In the Arctic, the US vessel Manhattan transits the Northwest Passage to assess a route for oil transport from Alaska. The US makes proposals to ship Alaska oil south by tanker through British Columbia coastal waters and the Strait of Juan de Fuca.

1970

Canada declares that no drilling or exploration will occur in the Strait of Georgia. British Columbia suspends work obligations on provincial permits in the same region until the question of ownership of the seabed in Strait has been addressed.

1971

The British Columbia legislature passes a resolution opposing tanker traffic off the west coast.

1972

Canada makes a policy decision not to approve any new exploration permits or programs in the west coast offshore, and to suspend all work obligations under existing permits (the federal moratorium).

1976

The British Columbia Court of Appeal decides that the Strait of Georgia is owned by British Columbia.

1981

Without limiting its earlier Crown reserve, British Columbia designates that all oil and gas in the area landward of a line drawn off the west coast of the Queen Charlotte Islands south to the west coast of Vancouver Island is reserved to British Columbia.

1984

The Supreme Court of Canada decides that the Strait of Georgia is owned by British Columbia.

1984-86

An Independent Federal-Provincial Environmental Review Panel is established to assess potential environmental and socio-economic effects of offshore oil and gas exploration. Its final report recommends that exploration could proceed if 92 specific recommendations are met.

1986-89

British Columbia and Canada conduct negotiations on the management and jurisdiction over offshore oil and gas exploration and development (the Pacific Accord).

1989

British Columbia makes a policy announcement that there will be no drilling offshore for at least five years (the provincial moratorium). Canada announces that it will not consider any development in the offshore until requested to by British Columbia.

2001

The Province updates a 1998 Technical Review by AGRA Earth and Environmental Limited, commissioning Jacques Whitford Environment Ltd. to report out on current offshore oil and gas technology. The report *British Columbia Offshore Oil and Gas Technology Update* concludes that "the evidence, from a relatively extensive review of conditions off British Columbia in comparison with other oil and gas areas worldwide and the latest engineering technology that applies to development, indicates that there are no unique fatal flaw issues that would rule out exploration and development activities."

In October, the BC Minister of Energy and Mines appoints a scientific panel to determine whether offshore oil and gas could be extracted in a manner that is scientifically sound and environmentally responsible. The panel members are:

- David Strong, panel chair, a professor in the School of Earth and Ocean Sciences at the University of Victoria and the university's former President;
- Derek Muggeridge, Dean of the Faculty of Science and Associate Vice-President of Research at Okanagan University College, and
- Patricia Gallaugher, Director of Continuing Studies in Science and Director of the Centre for Coastal Studies at Simon Fraser University.

An MLA Offshore Oil and Gas Task Force is struck to visit northern coastal communities during November and December and listen to the views of communities, local residents and First Nations. Its members are:

- Blair Lekstrom, task force chair, MLA-Peace River South
- Dr. John Wilson, MLA-Cariboo North
- Dennis MacKay, MLA-Bulkley Valley-Stikine
- Bill Belsey, MLA-North Coast
- Rod Visser, MLA-North Island
- Lorne Mayencourt, MLA-Vancouver/Burrard

The task force visits the communities of Port Hardy, Masset, Skidegate, Bella Bella, Bella Coola, Terrace, Kitimat, Kitkatla and Prince Rupert. More than 150 oral presentations and nearly 130 written submissions were received. The task force submitted its findings in a report to the Minister of Energy and Mines on Jan. 15, 2002.

2002

The February 12, 2002 Throne Speech states: "Last October, my government appointed an independent Scientific Panel to assist in determining whether offshore oil and gas exploration could be conducted in a manner that is scientifically sound and environmentally responsible. My government will move with caution to ensure that any activity taken in this regard will always be guided by sound science and an unswerving commitment to responsible environmental protection."

Dr. Strong's scientific panel concludes that "there is no inherent or fundamental inadequacy of science or technology, properly applied in an appropriate regulatory framework, to justify a blanket moratorium on such activities".

The MLA task force concludes that Northern communities, including First Nations, want to have a strong voice in the contemplation of offshore oil and gas.

The panel and task force make a number of recommendations for further work to been done before any activity begins.

In response, the Province provides the University of Northern British Columbia with a \$2 million grant to carry out scientific and technical research and develop a work plan responding to these recommendations. The first round of UNBC projects is initiated.

In November, the BC Energy Plan announces the establishment of a dedicated offshore oil and gas team to develop a provincial position, work with the federal government, and move effectively toward development of offshore resources.

2003-04

In January, the Province formally establishes the BC Offshore Oil and Gas Team.

The February 11, 2003 Speech from the Throne states that "by 2010, the Province wants to have an offshore oil and gas industry that is up and running, environmentally sound, and booming with job creation".

The Government of Canada commissions the Royal Society of Canada to conduct a review of the science issues and identify any significant gaps needing to be filled prior to lifting of the moratorium. In February 2004, the Royal Society's report concludes that "provided an adequate regulatory regime is put in place, there are no science gaps that need to be filled before lifting the moratoria on oil and gas development."

APPENDIX B: BC OFFSHORE OIL AND GAS TEAM MAY 2003 PROJECT PLAN

A. STRATEGIC CONTEXT

I. Mandate

The British Columbia Offshore Oil and Gas Team has been established to enable offshore oil and gas development to occur in British Columbia in a scientifically sound and environmentally responsible manner.

II. Principles

Within the context of British Columbia's November 2002 energy policy⁴⁰, and the commitment to develop British Columbia's Heartlands Economic Strategy, the British Columbia Offshore Oil and Gas Team will be guided by ten principles.

- 1. Offshore oil and gas development must be done in a scientifically sound and environmentally responsible manner.
- 2. Offshore oil and gas development must be consistent with British Columbia's ownership of and jurisdiction over these resources.
- 3. The Provincial government must meet its obligations regarding First Nations' rights and interests.
- 4. The Provincial government must consider the views of coastal residents in determining how to develop offshore oil and gas.
- 5. British Columbians must have access to accurate and understandable information about the potential benefits and risks associated with offshore oil and gas development.
- Any offshore regulatory regime must be results based and deal with fiscal, environmental, operational and health and safety issues in a manner that is accountable and efficient.
- 7. Offshore oil and gas development must contribute to a strong and vibrant provincial economy and to healthy coastal communities.
- 8. Offshore oil and gas development must co-exist with fishing, tourism and other marine industries.
- 9. Offshore oil and gas development must support innovation and development in British Columbia's marine and leading edge industries.
- 10. The Provincial government must support a business climate that encourages private sector investment in the development of British Columbia's offshore resources.

⁴⁰ British Columbia's energy policy as outlined in *Energy for our Future: A Plan for BC* includes: Low electricity rates and public ownership of BC Hydro; Secure, reliable supply; More private sector opportunities; Environmental responsibility and No nuclear power sources.

III. Goal

The British Columbia Offshore Oil and Gas Team will contribute to the province's Heartlands Economic Strategy by:

- providing the province with the information needed to make sound decisions on developing West Coast offshore oil and gas;
- creating the regulatory framework under which offshore oil and gas development may occur in British Columbia;
- fostering industry involvement in responsible resource exploration, development and production, and
- ensuring development provides benefits to First Nations and communities.

IV. Objectives

- Obtain the scientific, environmental, social and economic information needed to inform policy decisions regarding offshore oil and gas development.
- Involve First Nations in planning for offshore oil and gas development and ensure development reflects their legal and other interests.
- Involve coastal communities in planning for offshore oil and gas development and ensure development reflects their interests and views.
- Obtain the interests and views of industry, environmental leaders and other stakeholders and ensure development takes these into account.
- Develop the legal, regulatory and fiscal framework needed for responsible offshore oil and gas development.
- Work closely with the federal government to address offshore oil and gas development issues.
- Provide the public with full and accurate information about offshore oil and gas development.

V. Planning Context

The British Columbia Offshore Oil and Gas Team's service plan considers a number of factors that affect its operation. The most significant of these are outlined below.

- First Nations' rights and interests related to offshore oil and gas development are uncertain.
- The socio-economic impact of offshore oil and gas development on local values and existing commercial activities is undefined.
- Gaps in scientific, environmental and socio-economic knowledge hinder decision-making.
- Federal and provincial governments do not agree on ownership of some of the West Coast offshore oil and gas resources.

- Federal and provincial governments do not agree on the regulatory framework for development.
- Citizens question whether offshore oil and gas development can occur in an environmentally responsible manner.
- Offshore oil and gas investment decisions are made on a global scale.
- The public has access to limited factual information regarding the benefits and risks of offshore oil and gas development.
- British Columbia has significant experience regulating the in-shore oil and gas industry.
- The Government of British Columbia made a commitment to improve the fiscal and regulatory climate.
- British Columbia institutions have the ability to deliver additional training and education in new fields.
- Reports from the *Scientific Review Panel* and *Offshore Oil and Gas Task_Force* make recommendations on how to proceed toward resource development.
- Government has created the British Columbia Offshore Oil and Gas Team to focus exclusively on offshore oil and gas development.

B. STRATEGIC DIRECTIONS

Key Initiatives: Knowledge acquisition, analysis and sharing

Objective	Strategies	Outputs	Targets	
			March 31, 2004	March 31, 2005
Obtain the scientific, environmental, social and economic information needed to inform policy decisions regarding offshore oil and gas development.	Science and Environment Bring together existing key scientific data sets for the offshore (i.e. physical science; marine ecology; engineering; environmental impact and technological development)	 List of areas with highest perceived resource potential List of sensitive areas, where exploration may be prohibited or restricted Integrated, internet accessible GIS database 	System designed and populated with 50% of key data sets	Database completed
	Commission research to fill knowledge gaps	 Common Canada-British Columbia base map List of knowledge gaps 	Common base map completed and endorsed by federal and provincial users	
	Develop research partnerships	Research agreements and partnerships	One (1) research partnership	

Key Initiatives: Knowledge acquisition, analysis and sharing

Objective	Strategies	Outputs	Targets	
			March 31, 2004	March 31, 2005
Obtain the scientific, environmental, social and economic information needed to inform policy decisions regarding offshore oil and gas development.	Social and economic Bring together knowledge about the economic and social impact of offshore oil and gas development (dynamics of coastal economies; impact on communities of development activity)	 Integrated intranet database housing social and economic information List of knowledge gaps Plan to fill knowledge gaps 	Database designed and population commenced Plan being used to inform research decisions	Database maintained and refined
	 Assess benefits/risks models Commission research to fill knowledge gaps Develop research partnerships 	 Community-focused benefits and risks framework Research agreements and partnerships 	Draft Framework completed Existing partnerships assessed against mandate and deliverables	Framework being used

Key initiatives: First Nations

Objective	Strategies	Outputs	Targets	
			March 31, 2004 March 31, 2005	
Involve First Nations in planning for offshore oil and gas development and ensure development reflects their legal and other interests.	Meet directly with First Nations early in the information and development cycle to identify their interests in offshore oil and gas development Engage First Nations in identifying the basis for acceptable offshore oil and gas development Engage federal government regarding First Nations involvement in the development of offshore oil and gas	 Mutually acceptable approach to exchanging views and defining expectations Arrangements with First Nations defining their participation in offshore oil and gas development Federal - Provincial arrangement re: federal responsibilities associated with First Nations interests in the development of offshore oil and gas Options and models for government decision, including benefit sharing (eg. endowment fund, direct payments) 	Draft arrangements established between First Nations and British Columbia related to proceeding with offshore oil and gas development Draft arrangement established among British Columbia, Canada and First Nations related to proceeding with offshore oil and gas development Draft arrangement established among British Columbia, Canada and First Nations related to proceeding with offshore oil and gas development Formal arrangements finalized Positive public statement by First Nation representative(s) related to Offshore Oil and Gas Formal arrangements finalized Development plans reflect First Nations interests and conditions (post 2005)	

Key Initiatives: Communities

Objective	Strategies	Outputs	Targets	
			March 31, 2004	March 31, 2005
Involve coastal communities in planning for offshore oil and gas development and	Engage coastal community members, local and regional governments in identifying and	Regionally sensitive outreach plan	Regional outreach completed in 100% of regional centers	
ensure development reflects their interests and views.	clarifying community expectations related to offshore oil and gas development	Community-sensitive outreach plan(s) for designated areas	Community outreach plans completed for all designated areas	Community outreach completed in 100% of the designated areas
		Community-focused benefits and risks framework	Draft Framework completed	Refined Framework
		Options and models for government decision	Draft arrangements established with coastal communities, local and regional governments related to proceeding with offshore oil and gas development	Final Arrangements Development plans reflect views of coastal communities

Key Initiatives: Regulatory and legal

Objective	Strategies	Outputs	Targets	
			March 31, 2004	March 31, 2005
Develop the legal, regulatory and fiscal framework needed for responsible offshore oil and gas development.	Assess existing: offshore environmental, regulatory, health and safety regimes;	Provincial option(s) on a regulatory and legal framework for offshore oil and gas development	Provincial position(s) formulated for government decision	Implement Cabinet decisions
	 offshore oil and gas tenures, terms and conditions; offshore fiscal and royalty structures; environmental assessment procedures 	Fiscal and royalty options	Fiscal and royalty options formulated for government decision	

Key Initiatives: External and international

Objective	Strategies	Outputs	Targets	
			March 31, 2004	March 31, 2005
Obtain the interests and views of environmental leaders and other stakeholders and ensure development takes these into account.	 Meet with environmental groups and stakeholders to clarify issues, concerns and interests. Identify key environmental sector contacts and validators. Work towards an approach that integrates conservation and development. 	 Maps showing 'go' and 'no go' areas Issue regular Bulletins outlining issues and actions Public event involving validators 	'Go' and 'no-go' areas identified Two Bulletins issued Public event held	Four <i>Bulletins</i> issued

Key Initiatives: External and international

Objective	Strategies	Outputs	Tar	gets
			March 31, 2004	March 31, 2005
Obtain the interests and views of industry in developing 'rules of the game' for exploration and development.	 Meet with industry, to clarify issues, concerns and interests. Emphasize commitment to work with industry. Develop common planning framework, including technical timeline for seismic 	Draft Common Planning Framework	Draft Common Planning Framework	Seismic studies commence

Key Initiatives: Federal/provincial

Objective	Strategies	Outputs	Targets	
			March 31, 2004 March 31, 2005	
Work closely with the federal government to address offshore oil and gas development issues.	Work co-operatively with Canada ton federal public review of British Columbia Offshore	Provincial input to federal review (science, public, First Nations)	Provincial response to results of federal public review	
Participate in Atlantic Round Table	Review and assess inter-governmental regulatory structures and relationships in other jurisdictions vis-à-vis offshore oil and gas development	Survey of existing inter-governmental regulatory structures and relationships related to offshore oil and gas development and management	Survey report	
	Engage federal representatives in discussions essential to offshore oil and gas development	Recommendations on intergovernmental arrangements for use in British Columbia regarding offshore oil and gas development and management	Arrangements established between British Columbia and Canada regarding development of British Columbia's offshore oil and gas resource Agreement-in-Principle with Canada and First Nations on fiscal, regulatory regime	

Key initiatives: Public information/communication

Objective	Strategies	Outputs	Targets	
			March 31, 2004	March 31, 2005
Provide the public with full and accurate information about offshore oil	Develop integrated, measurable communications strategy	Accessible information related to offshore oil and gas	Increase awareness and understanding of offshore oil and gas development	Increase awareness and understanding of offshore oil and gas development
and gas development.	Make broad- spectrum of information easily available	 Diverse tools with consistent look and feel Consistent, multi-partner information products Web site 	Measurement and adjustment of communications strategy	Measurement and adjustment of communications strategy
	Early in discussions with external bodies, agree on way to publicly disclosure information		Offshore Oil and Gas Team recognized as reliable source of information	Offshore Oil and Gas Team recognized as reliable source of information
	Develop Web site		Web site maintained and measured to enhance usefulness	Web site maintained and measured to enhance usefulness