./cable/2008/06/08HALIFAX45.html:4833:UNCLAS SECTION 01 OF 08 HALIFAX 000045

SIPDIS

STATE FOR WHA/CAN, EB/ESC/ISC USDOE FOR IA (DEUTSCH)

E.O. 12958: N/A

TAGS: EPET ENRG PGOV CA

SUBJECT: ENERGY PROJECTS IN ATLANTIC CANADA - FACTS AND FIGURES

REF: 03 HALIFAX 0203 (NOTAL)

HALIFAX 00000045 001.2 OF 008

-----INTRODUCTION/SUMMARY:

- ¶1. This cable is a "primer" on the status of significant operating and future energy projects in Atlantic Canada. The Atlantic Provinces Economic Council (APEC), a regional think tank, reported in March 2008 that actual and proposed new investment in these projects had reached the level of \$42 billion. Unlike the 1990s, however, today's investments are focused less on offshore developments and more on a mixture of onshore projects such as Liquefied Natural Gas (LNG) facilities, oil refineries, pipelines, hydro and nuclear power generation, and other forms of renewable energy. What has not changed over the years is the overarching importance of the U.S. northeast energy market. New England is the market for approximately 85 percent of Atlantic Canada's international energy exports, which totaled \$16.6 billion in 2007. (The remaining 15 percent is divided among a number of other countries, none of which would be considered a prime secondary market.) Future demand in New England is also the driving force behind several new and proposed energy projects throughout the region.
- ¶2. The contents of this cable are structured as follows:
- ¶I. Oil and gas
 - ¶A. Offshore oil and gas projects

 - ¶1. Hibernia ¶2. Terra Nova ¶3. White Rose

 - ¶4. Hebron ¶5. Sable ¶6. Deep Panuke
 - ¶B. Onshore gas projects
 - ¶1. McCully Field

 - ¶2. Stealth Venture¶3. Alton Natural Gas Storage
 - ¶C. LNG projects
 - ¶1. Canaport LNG ¶2. MapleLNG

 - ¶3. Grassy Point LNG
 - ¶D. Pipelines
 - ¶1. Maritimes and Northeast Pipeline ¶2. Brunswick Pipeline
 - ¶E. Refineries
 - ¶1. Irving Refinery
 - ¶2. Eider Rock (2nd Irving Refinery)

 - ¶3. North Atlantic Refinery ¶4. Newfoundland and Labrador Refinery
- II. Hydroelectric Power
 - ¶A. Upper Churchill ¶B. Lower Churchill)
- III. Nuclear Power
 - ¶A. Point Lepreau
 - ¶B. Point Lepreau Two

IV. Other Projects

- $\P A$. New Brunswick International Power Line
- ¶B. Renewable Energy Projects

END INTRODUCTION/SUMMARY

¶I. Oil and Gas

 $\P A.$ Offshore Oil and Gas Projects

¶1. HIBERNIA

--Type: Offshore Oil

--Location: Newfoundland-Labrador; 195 miles

east-southeast of St. John's

--Owner/Operator: Owned jointly by ExxonMobil Canada (33.125%), Chevron Canada Resources (26.875%), Petro-Canada (20%), Canada Hibernia Holding Corporation (8.5%), Murphy Oil (6.5%) and StatoilHydro Canada Ltd (5%). Operator: ExxonMobil

--Status: Producing/Complete

--Start-up Date: Producing since November 1997

--Estimated Reserves: Reserves of 3 billion barrels; 865

HALIFAX 00000045 002.2 OF 008

million barrels recoverable reserves

--Production: 140,000 to 150,000 barrels per day

--Details: Discovered in 1979, Hibernia is the largest oil field offshore Newfoundland-Labrador and the first to be developed. The production facilities feature a Gravity Based Structure (GBS), topsides and offshore loading system.

--Web Address: http://www.hibernia.ca

--Latest Developments: A proposed expansion at South Hibernia would add as much as 300 million barrels to the recoverable reserves. The Hibernia partners expect to start the expansion project in 2009-2010.

¶2. TERRA NOVA

--Type: Offshore Oil

--Location: Newfoundland-Labrador; 217 miles

east-southeast of St. John's

--Owner/Operator: Owners: Petro-Canada (33.99%), ExxonMobil Canada (22%), Norsk Hydro Canada Oil & Gas (15%), Husky Oil (12.51%), Murphy Oil (12%), Mosbacher Operating Ltd. (3.5%) and Chevron Canada Resources (1%) Operator: Petro-Canada

--Status: Producing/Complete

--Start-up Date: Producing since January 2002

--Estimated Reserves: 370 million barrels recoverable reserves

--Production: 140,000 barrels per day

--Details: Discovered in 1984, Terra Nova is the second largest field offshore Canada's East Coast and the second to be developed. Unlike Hibernia, Terra Nova uses a Floating Production Storage and Offloading (FPSO) vessel system.

--Web Address:

http://www.petro-canada.ca/en/about/721.aspx

--Latest Developments: Petro-Canada will shut down production at Terra Nova for a scheduled 16-day maintenance program the last half of June 2008. In 2007, the project had been plagued by minor problems, including two week-long shutdowns in October and December for repairs.

¶3. WHITE ROSE

--Type: Offshore Oil

--Location: Newfoundland-Labrador; 217 miles

east-southeast of St. John's

--Owner/Operator: Owners: Husky Energy (72.5%); Petro-Canada (27.5%) Operator: Husky Energy

--Status: Producing/Complete

--Start-up Date: Producing since November 2005

--Estimated Reserves: 200-250 million barrels recoverable

reserves

- --Production: 100,000 barrels per day
- --Details: Discovered in 1984, White Rose is the third largest field offshore Canada's East Coast and the third to be developed. Like Terra Nova it uses a purpose-built floating-production, storage and offloading (FPSO) vessel and a subsea production system.
 - --Web Address: http://www.huskyenergy.ca/operations/canadaseastcoast/projects/whiterose.asp
- --Latest Developments: Husky's future plans for White Rose include developing satellite fields that should start producing by late 2009.

¶4. HEBRON

- --Type: Offshore Oil
- --Location: Newfoundland-Labrador; 217 miles

east-southeast of St. John's

- --Owner/Operator: Owners: Chevron Canada Resources (28%), ExxonMobil Canada (38%), Petro-Canada (24%) and Norsk Hydro Canada Oil & Gas (10%) Operator: Chevron Canada Resources
 - --Status: Planned/Proposed
 - --Start-up Date: Undetermined
 - --Estimated Reserves: 400-700 million barrels
 - --Production: 150,000 to 170,000 barrels of oil per day
 - --Cost: \$7 billion-\$11 billion
- --Details: Discovered in 1981, Hebron has the potential to become Newfoundland-Labrador's fourth offshore oil development and the project could also include development of the nearby Ben Nevis and West Ben Nevis fields. Like Hibernia, the partners would use a Gravity Base Structure (GBS) to develop the project.
 - --Web Address: http://www.chevron.ca/operations/exploration/atlantic.asp
- --Latest Developments: In August 2007, the project partners signed a Memorandum of Understanding (MOU) on fiscal and local benefits with the Government of Newfoundland and Labrador. The MOU forms the basis for future formal agreements on fiscal, equity and local benefits terms for a potential development project. As of June 2008, the parties had not

HALIFAX 00000045 003.2 OF 008

reached agreement on any of these issues.

$\P 5$. SABLE OFFSHORE ENERGY PROJECT

- --Type: Offshore Natural Gas
- --Location: Nova Scotia; 124 miles off Halifax
- --Owner/Operator: Owners: ExxonMobil Canada (50.8%), Shell Canada (31.3%), Imperial Oil Resources (9%), Pengrowth Corp. (8.4%) and Mosbacher Operating Limited (0.5%) Operator: ExxonMobil Canada
 - --Status: Producing/Complete
 - --Start-up Date: December 1999
 - --Estimated Reserves: 3 Trillion Cubic Feet
- --Production: 425 million cubic feet per day and 20,000 barrels of associated condensate and natural gas liquids
- --Details: The Sable Offshore Energy Project is divided into two tiers of offshore development. The first tier was completed in December 1999 and involved the development of the Thebaud, North Triumph, and Venture fields, as well as the construction of three offshore platforms, an onshore gas plant and an onshore fractionation plant. Tier II fields are Alma, South Venture and Glenelg. Alma began production in November 2003 followed by South Venture in December 2004. ExxonMobil and its partners are presently reviewing the future of the Glenelg field.
 - --Web Address: http://www.soep.com
- --Latest Developments: With the completion of a compression platform in 2007, the Sable development plan is now complete and the project owners are now focused on optimizing production.

¶6. DEEP PANUKE

--Type: Offshore Natural Gas

- --Location: Nova Scotia; 155 miles southeast of Halifax
- --Owner/Operator: EnCana Corporation of Calgary, Alberta
- --Status: Approved/Under Construction
- --Start-up Date: 2010 (target)
- --Estimated Reserves: 630 billion cubic feet
- --Production: 300 million cubic feet of gas per day
- --Cost: \$700 Million
- --Details: Discovered in 1998, the economics of developing Deep Panuke were not proven until 2007 when EnCana's Board of Directors gave the project the go-ahead and after they had received regulatory approval. The development plan calls for the use of jack-up mobile offshore production unit, subsea flow lines and wells, and an export pipeline.
 - --Web Address: http://www.encana.com/operations/canada/deeppanuke/index.htm
- --Latest Developments: The project is currently in the tendering/pre-construction phase.

¶B. Onshore Gas Projects

¶1. MCCULLY FIELD

- --Type: Onshore Natural Gas
- --Location: New Brunswick; near Sussex
- --Owner/Operator: Corridor Resources, a junior resource company based in Halifax
 - --Status: Producing/Complete
 - --Start-up Date: Operating since June 2007
- --Estimated Reserves: A proven plus probable gas-in-place (50% probability) of 722 billion cubic feet
 - --Production: 35 million cubic feet per day
- --Details: This project consists of a field gathering system, a gas plant, and a pipeline lateral. In June 2007, Corridor began supplying McCully natural gas to markets in the Maritimes and the Northeastern United States via the Maritimes & Northeast Pipeline.
 - --Web Address:
- http://www.corridor.ca/operations/mccully-fie ld.html
- --Latest Developments: The company intends to drill eight new development wells and one exploration well in 2008.

¶2. STEALTH VENTURES

- --Type: Onshore; coal-bed methane (natural gas from coal)
- --Location: Nova Scotia; abandoned coal mines in Springhill, Cumberland County.
 - --Owner/Operator: Stealth Ventures of Calgary, Alberta
 - --Status: Planned/Proposed
 - --Start-up Date: Undetermined
- $\mbox{--Estimated Reserves:} \mbox{ Estimated to contain 1.2 trillion cubic feet of coal gas}$
 - --Production: Undetermined
 - --Cost: \$10 million to date for exploration work

HALIFAX 00000045 004.2 OF 008

- --Details: Stealth has been exploring in the Springhill area since 2005 and has drilled three test wells. This project will be the province's first onshore gas development and intended markets are in the U.S. northeast and in Nova Scotia.
 - --Web Address: http://www.stealthventures.ca/
- $\mbox{--Latest Developments:} \mbox{ Further testing and feasibility studies are underway.}$

¶3. ALTON NATURAL GAS STORAGE

- --Type: Onshore Storage
- --Location: Nova Scotia; located in Alton, 30 miles north of Halifax
- --Owner/Operator: Owned by Fort Chicago Energy Partners of Calgary, Alberta (50%) and L.P. and Landis Energy Corporation also of Calgary, Alberta (50%)
 - --Status: Approved/Under construction
 - --Start-up Date: 2012
 - --Production: Initial capacity will be four to six BCF of

natural gas in four caverns, with a projected capacity of over 50 BCF.

- -- Cost: To be determined
- --Details: This project involves building an underground natural gas storage facility consisting of an initial 4 caverns with the capability of storing over 4 billion cubic feet (BCF) of natural gas. An additional 10 to 15 caverns could also be developed. The development plan calls for a lateral line to be built to the Maritimes and Northeast pipeline. The supplies of natural gas would come from either offshore, onshore or LNG facilities.
 - --Web Address: http://www.altongas.com/
- --Latest Developments: On December 18, 2007, the project received regulatory approval. The developers have already completed pre-construction work and the majority of the detailed engineering and surveying requirements

¶C. LNG PROJECTS

¶1. CANAPORT LNG

- --Location: New Brunswick; Saint John
- --Owner/Operator: Canaport LNG is a partnership between Irving Oil of New Brunswick (25%) and Repsol YPF of Spain (75%).
 - --Status: Approved/Under Construction
 - --Start-up Date: End of 2008
 - -- Production: 1 BCF a day of natural gas
 - --Cost: \$800 million
- --Details: When completed in late 2008, Canaport LNG will become the first LNG degasification plant in Canada, supplying natural gas to Canadian and American markets. The facility will have three, 160,000 cubic meter LNG storage tanks at start-up, but could be expanded to five. Gas will be transported to market via the Emera-owned Brunswick pipeline, which will connect with the Maritimes and Northeast Pipeline at the New Brunswick-Maine border.
 - --Web Address: http://www.canaportlng.com
- --Latest Developments: The overall project status is 76% complete (99% complete for offshore and 70% complete for onshore.)

¶2. MAPLELNG

- --Category: Oil/Gas --Location: Nova Scotia; Goldboro in Guysborough County --Owner/Operator: MapleLNG is a Nova Scotia company and the Canadian subsidiary of 4Gas and Suntera. 4Gas is an

independent company located in Rotterdam; Suntera is an international energy company with oil and gas assets in West Africa, North America and India.

- --Status: Planned/Proposed
- --Start-up Date: 2011
- --Production: 1 billion cubic feet of gas per day.
- --Cost: \$700 million
- --Details: The project calls for a marine terminal designed to handle LNG carriers with capacities ranging from 75,000 cubic meters to 250,000 cubic meters, three storage tanks, and regasification facilities. The terminal will be located adjacent to the Maritimes and Northeast Pipeline intake station at the Sable Offshore Energy Gas Plant in Goldboro. Gas would be transported to market via the Maritimes and Northeast
 - --Web Address: http://www.maplelng.com
- --Latest Developments: The project developers are currently waiting for federal environmental approval although the developers are still looking for a supplier.
 - ¶3. GRASSY PT. LNG TRANSSHIPMENT AND STORAGE TERMINAL

HALIFAX 00000045 005.2 OF 008

--Location: Newfoundland-Labrador; Grassy Point, Come-by-Chance Harbour, Placentia Bay --Owner/Operator: Newfoundland LNG Ltd., a

Newfoundland-Labrador company, jointly owned by North Atlantic Pipeline Partners, LP (50%) and LNG Partners, LLC (50%),

- --Status: Planned/Proposed
- --Start-up Date: December 2010
- --Production: Three jetties will have berthing capability for LNG tankers up to 265,000 cubic meters and eight LNG storage tanks $\frac{1}{2}$
 - --Cost: \$1 billion
- --Details: Intended markets are the U.S. and Atlantic Canada. When complete, the project will provide facilities for the following services: LNG cargo transfer, short and long-term storage of LNG, temporary vessel-based LNG storage and a lay-up site for in-transit LNG carriers
 - --Web Address: http://www.lngpartners.com
- --Latest Developments: The project has passed the provincial regulatory process and is currently undergoing a federal assessment.

$\P D$. Pipelines

¶1. MARITIMES & NORTHEAST PIPELINE

- --Location: Offshore Nova Scotia to Dracut Massachusetts
- --Owner/Operator: A joint venture of Spectra Energy (77.53%), Emera Inc. (12.92%), and ExxonMobil Canada (9.55%)
 - --Status: Producing/Completed
 - --Start-up Date: Operating since 1999
- --Production: System capacity is approximately 530 million cubic feet per day.
- --Details: Maritimes & Northeast Pipeline (M&NP) is an 860-mile transmission pipeline system built in 1999 to transport natural gas from developments offshore Nova Scotia to markets in Atlantic Canada and the northeastern United States. The M&NP system consists of a 30"/24" mainline that runs from the Sable Offshore Energy Inc. (SOEI) gas plant at landfall in Goldboro, through Nova Scotia, New Brunswick, Maine, New Hampshire, and Massachusetts. The mainline interconnects with Portland Natural Gas Transmission System, Tennessee Gas Transmission, and Algonquin Gas Transmission. Through lateral pipelines M&NP serves Canadian markets in Nova Scotia and New Brunswick.
 - --Web Address: http://www.mnpp.com/canada/index.html
- --Latest Developments: With its project now well established, the partners in M&NP are looking at new joint ventures with other regional energy developers.

¶2. BRUNSWICK PIPELINE

- --Location: from the Canaport LNG terminal in Saint John, to the existing Maritimes & Northeast Pipeline near St. Stephen, NB.
- --Owner/Operator: Owned by Emera Inc of Halifax, Nova Scotia, the parent company of Nova Scotia Power. Emera has contracted with Spectra Energy to carry out the permitting, design, construction and operation of the pipeline.
 - --Status: Approved/Under construction
 - --Start-up Date: November 2008
- --Production: 850 million cubic feet per day of re-gasified LNG. $\,$
 - --Cost: \$465 million
- --Details: Brunswick Pipeline is a 30-inch diameter, 90-mile pipeline which will connect the Canaport LNG terminal in Saint John, to the existing Maritimes & Northeast Pipeline.
 - --Web Address: http://www.brunswickpipeline.com
- --Latest Developments: This project is under construction and nearing completion although there are cost overrun issues. In May 2008 the project managers revealed that the cost of the project has increased from the forecasted \$350 million to \$465 due to higher than anticipated material and construction costs.

¶E. Refineries

$\P1.$ IRVING REFINERY

- --Location: Saint John, New Brunswick
- --Owner/Operator: Irving Oil of Saint John, New Brunswick

- --Status: Producing/Complete
- --Start-up Date: Operating since 1960
- --Production: 300,000 barrels per day
- --Details: The Irving refinery in Saint John is Canada's largest, producing over 300,000 barrels of energy products per day. From that daily production, the company exports the majority to the U.S. Northeast and ultra-low sulfur fuels to

HALIFAX 00000045 006.2 OF 008

California to meet that state's emissions standards.

- --Web Address:
- http://www.irvingoil.com/company/refinery.asp
- --Latest Developments: Irving is contemplating building a new refinery (the Eider Rock Project) adjacent to the existing facility.

¶2. EIDER ROCK REFINERY (SECOND IRVING REFINERY)

- --Location: New Brunswick; Saint John
- --Owner/Operator: Irving Oil of Saint John, New Brunswick
- --Status: Planned/Proposed
- --Start-up Date: 2015
- --Production: 300,000 barrels per day
- --Cost: \$7 Billion
- --Details: This proposed refinery would be built alongside Irving's existing 300,000 barrel-per-day refinery and near the Irving Canaport crude oil terminal.
 - --Web Address: http://www.irvingoil.com/company/erock.asp
- --Latest Developments: In March 2008, Irving Oil entered into a Memorandum of Understanding with BP which will see BP contribute \$40 million toward the engineering, design and feasibility for the project. The two companies will also investigate the possibility of forming a joint venture to build the facility although a final decision is not expected before ¶2009. If the parties proceed and obtain regulatory approval, construction could start in 2010 and be finished by 2015.

$\P3$. NORTH ATLANTIC REFINERY

- --Location: Newfoundland-Labrador; Come-by-Chance, Placentia Bay
- $-\mbox{--Owner/Operator:}$ Owned and operated by North Atlantic Refining, a subsidiary of Harvest Energy Trust of Calgary, Alberta
 - --Status: Producing/Complete
 - --Start-up Date: Operating since 1996
 - --Production: 115,000 barrels per day
- --Details: Operating since 1996, North Atlantic Refinery produces gasoline, ultra low sulfur diesel and jet fuel. The majority of the products are exported to the United States. The company also operates 69 gas stations and a home heating business and also supplies numerous commercial clients in Newfoundland-Labrador.
 - --Web Address: http://northatlantic.ca
- --Latest Developments: The NAR is one of the entities operating in the Placentia Bay industrial area, which also includes a transshipment facility at Whiffen Head for offshore oil and a construction facility at Bull Arm. It would also be the site for a future second refinery being proposed by Newfoundland and Labrador Refinery Corporation.

¶4. NEWFOUNDLAND AND LABRADOR REFINERY PROJECT

- --Location: Newfoundland-Labrador; Southern Head, Placentia Bay
- $-\mbox{--Owner/Operator:}$ Newfoundland and Labrador Refining Corporation which is owned by N-L based Altius Resources Inc. and private European entrepreneurs.
 - --Status: Planned/Proposed
 - --Start-up Date: 2011
 - --Production: 300,000 barrels per day
 - --Cost: \$5 Billion
- --Details: The development plan calls for the facility to process heavy sour crude at the site, a deepwater, ice-free port near the province's existing oil industry infrastructure on

Placentia Bay.

--Web Address: http://www.nlrefining.com/

--Latest Developments: The federal government approved the development plan in April 2008. However, the developers have not yet contracted with partners and lenders for the project.

II. Hydroelectric Power

¶A. UPPER CHURCHILL

--Type: Power Generation

--Location: Newfoundland-Labrador; Churchill River, Labrador

--Owner/Operator: The Churchill River Power Project is a joint initiative of the provinces of Newfoundland and Labrador and Quebec and their respective hydroelectric utilities, Hydro Quebec and Newfoundland and Labrador Hydro.

--Status: Producing/Complete

HALIFAX 00000045 007.2 OF 008

- --Start-up Date: Operating since 1971
- --Production: 5,428 MW
- --Details: The massive hydroelectric potential of the falls was realized for decades, but it was not until the completion of the Quebec, North Shore and Labrador Railway in 1954 and the development of long-distance electric-power transmission technology by Hydro-Quebec that exploitation became feasible. Complex development negotiations between the governments of Newfoundland and Quebec (through which the power would have to pass) were not completed until 1969. The project took nine years to build, employed more than 30,000 people and cost \$950 million. The first units began transmitting December 1971; the eleventh and final unit went into service in 1974.
 - --Web Address: www.nlh.nl.ca
- --Latest Developments: The sales contract between the governments of Newfoundland-Labrador and Quebec for the Churchill power is a decades-long, contentious political issue. Under the terms of the contract, which does not expire until 2041, the price that Quebec pays for the Churchill power is fixed at 1969 prices. With the dramatic rise in energy costs over the years, Hydro-Quebec has reaped substantial profits from the resale of Churchill Falls power. The Government of Newfoundland-Labrador has tried unsuccessfully to have the terms amended and this issue is a factor in the current negotiations over development of the Lower Churchill River.

¶B. LOWER CHURCHILL PROJECT

- --Location: Newfoundland-Labrador; Churchill River, Labrador
- --Owner/Operator: Owned and managed by the Churchill Falls Corporation, 51% owned by the Government of Newfoundland-Labrador and 49% by the Government of Canada.
 - --Status: Planned/Proposed
 - --Start-up Date: Undetermined
- --Production: 2,800 megawatts of power (enough to power 1.5 million homes) $\,$
 - --Cost: \$6-9 billion
- --Details: The existing 5,428 MW Churchill Falls generating station, which began producing power in 1971, harnesses about 65 per cent of the potential generating capacity of the Churchill River. The remaining 35 per cent is located at two sites on the lower Churchill River, known as the Lower Churchill Project. These sites are considered two of the best undeveloped hydroelectric sites in North America: Gull Island, located 140 miles downstream from the existing Churchill Falls Generating Station; and Muskrat Falls, located 38 miles downstream from Gull Island.
 - --Web Address: http://www.lowerchurchillproject.ca
 - --Latest Developments: Should the project go ahead, there

will be a nine-year construction period which would begin at Gull Island followed by first power five years later. Construction of the Muskrat Falls would be started three years after the start of the Gull Island construction. A major decision that has yet to be made is how to transmit the power to market: via an overland route through Quebec or via undersea cables to the Island of Newfoundland and through New Brunswick or Nova Scotia. Environmental impacts and an agreement with the Innu Nation are other critical factors.

III. Nuclear Power

$\P A$. POINT LEPREAU GENERATING STATION

- --Location: New Brunswick; Point Lepreau
- --Owner/Operator: Owned and operated by the New Brunswick Power Nuclear Corporation, a subsidiary of the provincially-owned New Brunswick Power Corporation
 - --Status: Shutdown for refit until September 2009
 - --Start-up Date: Operating since 1983
 - --Production: capacity of 635 MW
- --Details: Point Lepreau has one nuclear reactor, a CANDU-6 unit, with net capacity of 635 MW. It was the first CANDU-6 to be licensed for operation and to begin commercial operation. The unit supplies about 30% of the energy consumed in the province.
- --Web Address: http://nuclear.nbpower.com/en/default.aspx --Latest Developments: Point Lepreau is currently shutdown for a \$1.4 billion refit, (with a September 2009 target for completion) which will extend the facility's life to 2032.
 - ¶B. 2ND LEPREAU STATION

HALIFAX 00000045 008.2 OF 008

- --Location: New Brunswick; Point Lepreau
- $-\text{-Owner/Operator:}\$ The facility would be owned and operated by the New Brunswick Power Nuclear Corporation, a subsidiary of the provincially-owned New Brunswick Power Corporation.
 - --Status: Under Consideration
 - --Start-up Date: Undetermined
 - --Production: 1,100 megawatts
 - --Cost: \$4-5 billion
- --Details: This project would involve building a new reactor to complement the existing reactor at the Point Lepreau site. An independent consulting firm said in February 2008 that this project could be economically viable if the proponents could confirm domestic and U.S. markets. However, LNG and natural gas generation facilities could be major competitors for a second plant.
- --Web Address: http://www.gnb.ca/0085/Lepreau-e.asp --Latest Developments: As of June 2008, the New Brunswick Provincial government had not made a final decision to proceed with the project.

IV. Other Projects

¶A. NEW BRUNSWICK-MAINE INTERNATIONAL POWER LINE

- --Type: Electricity Transmission
- --Location: Point Lepreau, New Brunswick to Orrington,

Maine

- --Owner/Operator: A joint development between NB Power Transmission (a subsidiary of provincially-owned New Brunswick Power) and Bangor Hydro (a subsidiary of Emera of Halifax).
 - --Status: Producing/Complete
 - --Start-up Date: Operating since December 2007

- --Production: 345 Kilovolts
- --Details: This is the second international transmission line from $\operatorname{New}\nolimits$ Brunswick to Maine.
 - --Web Address: http://transmission.nbpower.com/en/intlpowerline/intlpowerline.aspx
- --Latest Developments: NB Power is involved in a dispute with New England utilities over tariffs on the line which has left the transmission line underutilized.

¶B. RENEWABLE ENERGY PROJECTS

Tidal power is a growing area of interest in Nova Scotia and New Brunswick. One Nova Scotia company, Minas Basin Pulp and Power, will be building a \$12 million plant designed to harness the tides of the Bay of Fundy. Three other separate groups will spend \$12-15 million each testing their own tidal turbines at this facility, the results of which will be used to evaluate the potential for a full scale commercial tidal generating facility. In other renewable energy projects, there are numerous wind farms throughout the region that are nearing completion over the next two-three years. The average size is approximately 35 MW. FOSTER