Assessment of Natural Gas Resources in Canada

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Over the past thirty years, the Geological Survey of Canada, provincial governments and industry have conducted assessments of natural gas resources. The Canadian Gas Potential Committee made the most recent study. It reported on the assessment of the natural gas resources in Canada in its second report published in September 2001, and that report forms the basis for this paper. One hundred and eighty-four conventional gas exploration plays were recognized. An experienced volunteer team of exploration professionals conducted assessments of undiscovered gas potential over a four-year period. The team used technical judgment, statistical techniques and a unique peer review process to make a comprehensive assessment of undiscovered gas potential and estimates of the size of individual undiscovered gas accumulations.

The Western Canada Sedimentary Basin is now and will continue to be the main gas supply area in Canada. It is estimated to hold 88 trillion cubic feet, 64% of the estimated total Undiscovered Nominal Marketable Gas in Canada.

Non-conventional gas resources include coalbed methane, tight gas, shale gas and gas hydrates. Volumes of gas in place are large, but technological advances will be required to define the recoverable resource base and to extract gas from non-conventional sources at rates and costs that are attractive to investors.

Assessments of gas potential made by the Canadian Gas Potential Committee were reviewed in context with other resource estimates that are used by the National Energy Board.