For the seminaire entitled

A Real Options Analysis of a CO_2 Sequestration Project

CIRANO welcomes

Dr. David Laughton
University of Alberta

From 3:30PM to 5:00PM

2020, University, 25th floor, Montreal

The seminar will present an application of real options analysis to the evaluation of a geological CO_2 sequestration option. The real options approach combines decision tree analysis (to take care of flexibility considerations in a situation that involves sequential decision-making) with modern asset pricing (to deal with complex issues of uncertainty in project development).

The analysis is based on a quantitative model of the resolution of uncertainty about natural gas markets and the regulation of greenhouse gas emissions. To do this modelling, Dr. Laughton gathered together a group arising from process that he was asked to lead a few years ago to bring together Canadian academics to work jointly on the climate change issue. This group includes Rick Hyndman, the former Alberta Deputy Minister of Energy, now a senior advisor on climate change issues to the Canadian Association of Petroleum Producers, Andrew Weaver and Nathan Gillett of the University of Victoria and Myles Allen of Oxford University, who have been key participants in the Intergovernmental Panel on Climate Change (IPCC) process, focussing on the assessment of climate models, and Mort Webster of the University of North Carolina and MIT, and Jonathan Kohler of Cambridge University, who have been key participants in programmes in the USA and Europe to conduct integrated assessments of the climate change issue.

Real options analysis provides a substantially different assessment of the sequestration option from standard discounted cash-flow (DCF) analysis. Dr.Laughton will explain the source of these differences. He will also go into details about some of the considerations that arose in creating the underlying uncertainty model used.

Registration and information : Éric Gravel at 985-4000 ext. 3032 or eric.gravel@cirano.qc.ca

print