

Shale gas drillers face scrutiny in U.S.

Congressional committee includes two Canadian firms in its investigation of controversial practice of hydraulic fracturing

SHAWN McCARTHY

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North American drilling companies' methods are facing growing scrutiny that may curtail their efforts to tap a key U.S. source of natural gas.

In the latest signal of the increasing public and political concern over the drilling, a U.S. congressional committee is investigating drilling firms, including two Calgary companies, over concerns that their drilling for shale gas deposits may be contaminating water supplies. Calfrac Well Services Ltd. () and Sanjel Corp. have received letters from the House committee on energy and commerce, requesting information on all wells they've drilled over the past four years using a method known as hydraulic fracturing – including proximity to ground water sources and the chemicals used in the process.

The congressional investigation is part of a growing controversy in the U.S. over the practice of hydraulic fracturing, which injects solvents into gas-bearing geologic structures to break open the rock and release the hydrocarbons. The technique is key to the commercial development of North American shale gas deposits, an immense resource that has transformed the continent's energy picture.

The oil and gas industry warns that unwarranted regulatory burdens could slow the development of the strategic resource. And it insists that there is no threat to drinking water from the drilling practice – solvents are injected thousands of metres below any drinking water sources.

However, New York state, which sits atop stretches of the immense Marcellus shale gas deposit, has imposed a moratorium on drilling until it ensures the development won't threaten water sources.

There is also a push in Washington to increase federal regulation of the industry.

In Canada, provinces regulate the drilling industry. The B.C. government has raised questions about waste water treatment from deep drilling in the Montney and Horn River gas basins in the rugged northeastern part of the province, but there has been little public debate.

Calfrac received its letter late last week, but Tom Medvedic, its senior vice-president for corporate development, said the company could not comment until it had more fully reviewed it.

“At this stage, we're not really in a position to provide any comment ... There is a lot of information that is being requested,” Mr. Medvedic said.

“The fracturing process has been around for decades and, in that context, we certainly haven’t been presented with any challenges like are now being projected.”

Officials with Sanjel, a privately owned, Alberta-based company, could not be reached for comment.

The investigation is being conducted by the House subcommittee on energy and environment, amid growing calls for the U.S. Environmental Protection Agency to regulate the drilling industry. The subcommittee is chaired by Massachusetts Democrat Edward Markey, who is acting with Henry Waxman, the California Democrat who heads the full House energy and commerce committee.

In addition to Calfrac and Sanjel, the committee requested documentation from Halliburton Co., BJ Services Co., Schlumberger Ltd., Frac Tech Services Ltd., Superior Well Services Inc., and Universal Well Services Inc.

In a memorandum explaining their action, Mr. Markey and Mr. Waxman said the development of shale gas is “one of the most promising trends in U.S. energy supplies,” with the potential to meet American gas demand for decades.

“But as the use of these [drilling] technologies expands, there needs to be oversight to ensure that their use does not threaten the public health of nearby communities,” they said.

The congressmen said Halliburton, BJ and Schlumberger had agreed with the EPA to end the use of diesel and other highly toxic chemicals in their hydraulic fracturing, but that Halliburton and BJ had continued to use diesel.

The oil and gas industry argues state regulators are already providing that oversight, and worry that excessive federal regulation could discourage investment in the new energy source.

“Hydraulic fracturing is a safe technology critical to developing the nation’s vast natural gas reserves,” the American Petroleum Institute said in a release.

“It has been used for more than 60 years in more than one million U.S. wells without a single confirmed instance of groundwater contamination.”

The environmental controversy could delay development of the Marcellus reservoir, said Bill Gwozd, vice-president of gas services for Ziff Energy Group in Calgary.

There are some 65 rigs operating in Pennsylvania – most of them doing horizontal drilling required for shale gas plays – and none at work across the state line in New York.

In addition to raising concerns about waste water treatment, Pennsylvania Gov. Ed Rendell has proposed a 5-per-cent tax on all gas produced in the state, a measure that the industry says could seriously undermine the economics of the shale gas development.

“The goose with the golden egg story pops up here,” Mr. Gwozd said.

“Operations-type limitations include perceived and real environmental issues ... although getting the facts on the table would be a huge first step.”

Email Comments



[Alan Burke](#)

2/22/2010 2:49:25 PM

Future Earth: Addicted To Power

Monday February 22 at 10 pm ET/PT on CBC News Network

Modern life would be impossible without enough energy, but it's an addiction that could cost the Earth. We rely on fossil fuels - oil, coal, and gas - which all emit the carbon that contributes to global warming. The dilemma is how to keep the lights on without cooking the planet.

All the available power alternatives bring terrifying risks; nuclear power produces lethally radioactive waste, which could poison a city such as London. Dams produce clean, sustainable hydroelectric power - but future extreme weather may test them to destruction threatening hundreds of thousands of lives. The Holy Grail is plentiful clean energy such as wind and solar power but they are far from providing power on the scale we need, and they're intermittent ♦ sometimes the wind doesn't blow and you don't get much solar power at night. Nuclear fusion - creating the sun on Earth - may provide the answer but it's a way off. Whatever the energy source it will all be for nothing if it can't get from the power plant to our homes. Unless the grid itself is upgraded we will be instantly plunged back into the dark ages as it fails under the increasing load.

Future Earth: Addicted to Power illustrates the disastrous consequences of continuing our addiction to power through photo-real CGI, but it also includes gripping interviews with experts who explore how adopting new technologies and making changes to the way we live can avert these disasters.

Related Video - Future Earth: Addicted To Power

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2/22/2010 11:07:41 AM

“We do not see an immediate need to endanger the quality of our 150-yr-old drinking water system for the sake of short-term rewards posed by natural gas extraction.” - Statement by the Regional Plan Association of NY, NJ and CT. (This is an organization of planners, developers, architects, bankers, academics, etc etc.)



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2/22/2010 10:45:38 AM

Fracking is becoming a big concern in New York City because our water is unfiltered, and comes mostly from reservoirs in the Catskill Mountains. The purity of these reservoirs has been zealously protected for almost a hundred years.

Now, a couple gas companies want to drill there, pumping toxic chemicals into the Marcellus Shale formation. If contamination occurs, a water filtration plant will have to be rapidly built. Estimated price tag for the taxpayers - \$9 billion.

Since the Catskill watershed sits above only a small fraction of the Marcellus formation, since the US has massive reserves of energy, and since millions of Americans are still proud energy hogs, why drill in THAT small portion, at such an expensive risk?



[n wood](#)

2/22/2010 10:01:23 AM

Interesting article. It is good to hear they are at least investigating it. I am dissapointed, however, in that there seems to be very little information about hydraulic fracturing in this article. Just reading the article I'm not sure if the groundwater contamination is a myth or if it is a serious concern. What's the average depth of the drilling? What solvents do they use? Have there been any academic studies published in the past about this? How many reports of "contaminate" ground water have there been?

For the length of this article, it's amazing how little information there is in it.



[Jade Dragon](#)

2/22/2010 9:19:57 AM

Sometimes I think that the ecology fascists will not be happy until we return to the days of the horse and buggy and heating our homes with wood. Theirs is a knee-jerk reaction: if it is a fossil fuel it must be bad so therefore we must regulate the hell out of it in order to kill it off. Personally, I a wood fire is nice but I think that I would like to keep the natural gas furnace that heats my house.