

Oil & Gas Development

Opportunities to Minimize Environmental Impacts on Your Land



Oil or gas wells on private land have become a common sight. If you are considering this type of development on your land, you can play a key role in working with the oil or gas company to create a lease agreement that ensures minimal possible impacts to your wildlife, their habitats, and your agricultural resources. Being informed is the best way to make a decision that is right for your situation.

With information updated to 2010, this fact sheet outlines what you can do when the oilpatch comes drilling in your backyard. It identifies major issues to consider and where to find additional information to help you (see back page). The fact sheet has been revised by Mary Griffiths, lead author of "When the Oilpatch Comes to Your Backyard" which was published by the Pembina Institute (second edition, 2004).

WHAT YOU NEED TO KNOW ABOUT SEISMIC SURVEYS

An oil or gas project may start with a seismic survey to locate the mineral resources. The company sends a permit agent to negotiate for permission to conduct a seismic survey, while later a land agent deals with well-drilling and pipeline activity.

Do you know what to ask, if a permit agent seeks permission for seismic operations? Did you know that you don't have to allow seismic activity on land you own? If you rent land, the permit agent must obtain permission from the landowner. If you hold an agricultural lease on public land, different rules apply.

The Farmers' Advocate Office provides an excellent overview of rules for public and private land in *Seismic Operations and Landowners' Rights*, which is on their website. It includes a table with minimum setback distances from wells and other structures and explains that landowners can negotiate to get their water wells and springs tested prior to seismic exploration. Such tests give you information on baseline conditions, should the seismic activity affect your well or spring. *Water Well Testing Guidelines for Landowners Involved in Seismic Activity*, another Farmers' Advocate publication, includes a form for recording tests. Alberta Sustainable Resource Development regulates all seismic exploration in the province, and their Geophysical Inspector Program handles complaints.

If you do not allow the seismic crew on your land, they will probably locate their line in the adjacent road allowance. However, a company can still return later to put a well on your land.

The first sign that a company wants to drill a well or put a pipeline across your land might be a visit from a surveyor. A registered land surveyor must be allowed to enter and conduct surveys on private land, but the surveyor is liable for any damage the survey team may cause.

WHEN THE LAND AGENT CALLS

Do you know what you need to consider when a land agent wants to negotiate the location of a well or pipeline on your land? Doing your homework can save you time and money and help protect your land.

First it is important to carefully read the information from the Energy Resources Conservation Board (ERCB) and the company, which the land agent must give you. This includes a letter from the Chairman of the ERCB, the brochure *Understanding Oil and Gas Development in Alberta* and EnerFAQs No. 7, *Proposed Oil and Gas Development: A Landowner's Guide*. EnerFAQs No. 7 suggests questions you might want to ask the company about their proposed project. It also lists other EnerFAQs which deal with subjects such as setbacks, sour gas and coalbed methane. When reading the company's information package about the well, pipeline or other project it is proposing, think carefully about the way the activity will affect you and future plans for your land or farming operations.

If you have studied the *Landowner's Roadmap for Energy Development: Preplanning*, from the Farmers' Advocate website, you will already have identified any issues you want to negotiate with the company. Think carefully before you sign the company's documents, even if you have no objections to an oil or gas well on your land. At least take time to read *Negotiating Surface Rights* and learn about compensation on the Farmers' Advocate website. Make a list of things you want to find out and discuss.

THINK BEFORE YOU SIGN

A well or pipeline will be in place for many years, so think about your future farm operations. How will the proposed location of the well or pipeline limit the movement of farm equipment or affect possible plans for building or subdivision? If necessary, negotiate with the company to find a better location to reduce the impact on your activities.

The company may be able to change the surface location of a well and, if necessary, use directional drilling to access a down-hole location from an adjacent land surface. Think carefully about the pipeline route before signing a pipeline right-of-way agreement. Will the route avoid wetlands and/or other sensitive wildlife areas? (see back page for contact information regarding wildlife). The ERCB sets minimum setback distances for wells and pipelines, but landowners may want facilities somewhat farther from their home. A more distant location is probably desirable if the well will produce sour gas or have noisy equipment. If the company is drilling for shallow gas or coalbed methane, ask if it has plans for a compressor. Noise from gas compressors can be troublesome, but modern compressors can be quiet, so negotiate for quiet equipment. Also, consider whether you want to negotiate for your water well to be tested. This is required for some coalbed methane wells (see next section).

Well drilling generates large volumes of waste in the form of drilling mud and drill cuttings that require storage and disposal. ERCB *Directive 50: Drilling Waste Management* sets out how a company must dispose of drilling mud. Decide if you want the company to remove all drilling waste from your land or to handle them in a certain way.

After a company has drilled a well, it must be tested. The ERCB tells companies what they must do in *Directive 60: Upstream Petroleum Industry Flaring*. The limitations on flaring are more stringent than in the past, but you may want to find out how long well test flaring will last and, if flaring is a health concern, ask the company to evaluate alternatives,

such as inline testing or the use of a high-efficiency incinerator. The best option may depend on local conditions.

It's a good idea to think about reclamation before any work starts on a well site or pipeline and to record the conditions on the current site, as a baseline against which to measure future reclamation.

PROTECTING YOUR WATER WELL

It is not only wise to get your water well tested if it's close to seismic operations, water well testing may also be necessary or advisable before drilling, to provide baseline data. Alberta Environment requires a company to test water wells within a minimum 600 metre radius of a proposed coalbed methane well, if the completion depth of the proposed well will be above the base of groundwater protection. The base of groundwater protection is set to protect shallower, non-saline water (that is, water which has no more than 4,000 milligrams of total dissolved solids per litre). The base of groundwater protection varies in depth across the province. Alberta Environment's *Standard for Baseline Water-Well Testing for Coalbed Methane/Natural Gas in Coal* sets out testing requirements for water volume and water quality. If there is free gas in the water, that must also be sampled. Alberta Environment's *Baseline Water Well Testing Template* can be used for voluntary water well testing, as well as to meet the rules for coalbed methane drilling.

The ERCB implements Alberta Environment's requirements for baseline water well testing through Directive 35. The ERCB also requires companies to monitor and report on water produced from any oil and gas wells completed above the base of groundwater protection (Directive 44). If a company wants to divert non-saline groundwater Alberta Environment's 2004 *Guidelines for Groundwater Diversion for Coalbed Methane/Natural Gas in Coal Development* apply at the time of writing, but will be updated in conjunction with a revised ERCB process.

There can be many reasons for a problem water well. They are explained in *Water Wells that Last for Generations*, which is available on the Farmers' Advocate website. If you think that a water well problem was caused by oil or gas development, first try to resolve the issue with the company. Any outstanding problems with seismic exploration should be reported to Alberta Sustainable Resource Development's geophysical inspector. Alberta Environment handles complaints about water wells that may be affected by oil and gas drilling. The Farmers' Advocate Office administers the Water Well Restoration or Replacement Program.

GET HELP WHEN NEGOTIATING WITH THE OIL PATCH

It can be intimidating when the land agent returns to ask you to sign the lease agreement. Ask for an explanation of anything you do not understand in the draft agreement and discuss issues that concern you. When negotiating any conditions that you want added to the lease agreement, remember that some give and take might be necessary. For successful negotiations both you and the company must be able to obtain your bottom-line objectives and be willing to reach an agreement with each other. Remember to get everything you agree in writing, by modifying the draft lease agreement which the company offers. If necessary, the Farmers' Advocate Office can provide advice on the wording of the agreement.

Did you know that if you can't resolve all issues with the company, you can ask the Energy Resources Conservation Board (ERCB) to facilitate a meeting? The Board has trained staff who can act as facilitators at informal "kitchen table" meetings between you and the company. If direct negotiations fail, the ERCB can identify key concerns and help you to access its Appropriate Dispute Resolution process. This process can be used for disputes that arise prior to signing a lease agreement or for any issues that cannot be resolved regarding a company's operations.

In those cases where a company is unable to reach agreement with a landowner or others who are directly affected, it has to tell the ERCB when it makes its application for a licence. In fact, the company has to

submit a non-routine application in which it outlines the issues of concern (as required in *Directive 56: Energy Development Applications and Schedules*). The Board will consider these issues before deciding whether or not to provide a licence.

The ERCB does not deal with disputes relating to compensation. If you and the company can agree on everything except compensation, the company may ask the ERCB for a licence and then apply to the Surface Rights Board for a right of entry order. If the Surface Rights Board grants entry, it must hold a hearing to determine the appropriate compensation. The full process is described on the Surface Rights Board's website. The Board bases compensation on several factors, including adverse effects. A publication on the Farmers' Advocate website, *Updated Definition of Adverse Effect Within a Surface Lease*, helps identify the effects which you need to consider when estimating the cost of adverse effects.

WHAT ABOUT NEIGHBOURS OF OIL AND GAS DEVELOPMENTS?

The ERCB expects a company not only to reach agreement with the landowner but also with others in the area who might be directly affected by an activity. The Board sets out the minimum notification and consultation distances in several tables in *Directive 56: Energy Development Applications and Schedules*. Although directives are written for industry, landowners and neighbours may want to read Directive 56, Section 2, Participant Involvement in, which clearly sets out exactly who a company is required to consult or notify.

It can be helpful to meet with other landowners by joining a surface rights group or synergy group. The ERCB can tell you if there is one in your area.

WHERE TO GET MORE INFORMATION

All Alberta government departments can be accessed free of charge through the government RITE line, 310-0000.

Government body	Selected responsibilities	Website
Alberta Energy Phone (Information Centre): 780-427-0265	Oversight of oil and gas development in province, including coalbed methane	www.energy.gov.ab.ca/OurBusiness/Oil.asp www.energy.gov.ab.ca/OurBusiness/Gas.asp
Alberta Environment Phone (Information Centre): 780-427-2700	Surface water and groundwater protection Baseline water well testing for coalbed methane development Land reclamation (on abandoned well sites) on private land	environment.alberta.ca/01316.html www.environment.alberta.ca/01206.html www.environment.alberta.ca/01107.html
Alberta Sustainable Resource Development Toll-free phone (Information Centre): 1-877-944-0313	Seismic exploration on private and public land, including exploration directives Land reclamation on public land Public land management Ask for your regional SRD biologist regarding wildlife issues (including set-back distances for Species at Risk).	www.srd.alberta.ca/MapsFormsPublications/Forms/LandsForms/Directives.aspx www.srd.alberta.ca/ManagingPrograms/Lands/IndustrialDevelopmentReclamation/IndustrialDevelopmentReclamation.aspx srd.alberta.ca/AboutUs/SRDContacts/documents/SRDContacts-WildlifeManagementAreaContacts-June2010.pdf
Energy Resources Conservation Board (ERCB) Phone (Customer Contact Centre): 403-297-8311, or regional offices in Wainwright or Red Deer	Regulation of drilling and production of oil and gas, including Alberta pipelines. See the Public Zone tab on the web site. Directives are found via the Industry Zone tab; then select "Rules, Regulations, Requirements".	www.ercb.ca
Farmers' Advocate Office Phone: 780-310-FARM (3276)	Main web page with links Information on energy-related concerns and on water wells	www1.agric.gov.ab.ca/\$department/deptdocs.nsf/all/ofa2621 www1.agric.gov.ab.ca/\$department/deptdocs.nsf/all/ofa11058
National Energy Board Toll-free phone (Landowner Inquiries): 1-800-899-1265	Inter-provincial and international pipelines	www.neb.gc.ca/clf-nsi/rthnb/nvlvngthpblc/nvlvngthpblc-eng.html
Surface Rights Board Phone: 780-427-2444	Right-of-entry issues and compensation	www.surfacerights.gov.ab.ca/home/default.aspx

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Interested landowners are encouraged to contact:

**OPERATION GRASSLAND COMMUNITY
PARKLAND STEWARDSHIP PROGRAM**

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