

Incident Reporting Requirements

Directive PNG014

December 2016

Version 2.0

Governing Legislation:

Acts: *The Oil and Gas Conservation Act*
 The Pipelines Act, 1998

Regulations: *The Oil and Gas Conservation Regulations, 2012*
 The Pipelines Regulations, 2000

Record of Change

Version	Date	Author	Description
0	September, 2015	PNG	Draft
1.0	February, 2016	PNG	Draft - revised based on public comments.
2.0	December , 2016	PNG	Live version, updated based on review of comments. MRO 496/15

Contents

1.	Introduction	4
1.1	Governing Legislation.....	4
1.2	Special Notice to Pipeline Licensees	4
1.3	Definitions.....	4
2.	Incident Response Overview.....	6
2.1	Incidents Subject to this Directive	6
2.2	Incident Response Process.....	6
3.	Initial Incident Notification	7
3.1	Immediate Telephone Notification by Operator	7
3.2	IRIS Notification by Operator	7
3.3	Notification by Person Other than an Operator	7
4.	Incident Reporting Requirements and Time Lines.....	7
4.1	Immediate Telephone Notification.....	7
4.2	Initial Incident Notification in IRIS	8
4.3	Detailed Incident Report.....	8
4.4	Incident Reclamation Report (IRR).....	8
4.5	Exceptions to IRR Submission Requirements.....	9
4.6	Relief from IRR Submission Requirements	10
4.7	Metallurgical Report on Pipeline Failures.....	10
5.	Compliance and Enforcement.....	10
	Appendix 1: Incidents Subject to Notification and Reporting	11
	Appendix 2: Field Office Locations and Areas.....	13
	Appendix 3: Incident Reporting Flow Chart.....	14

1. Introduction

This Directive sets out the requirements of the Saskatchewan Ministry of the Economy (the Ministry) for regulating the reporting of spills and other incidents in relation to wells, facilities, flowlines and pipelines. It provides listing of what constitutes a reportable incident; details of when and how an incident should be reported; and the consequences of non-compliance with these requirements.

Questions concerning the requirements set out in this document should be directed to the PNG Support line at 1-855-219-9373 or email at PNG.support@gov.sk.ca.

1.1 Governing Legislation

The requirements outlined in this Directive are based on *The Oil and Gas Conservation Act (OGCA)*, *The Pipelines Act, 1998 (PA)*, *The Oil and Gas Conservation Regulations, 2012 (OGCR)* and *The Pipelines Regulations, 2000 (PR)*.

Please note that section 4.4 of this Directive deals with the immediate remediation and, where necessary, reclamation of land subject to an incident. Final reclamation of an abandoned well site or facility site is governed by the requirements of *Directive PNG016: Acknowledgement of Reclamation Requirements*. Operators should consult *Directive PNG016* to understand the difference between incident reclamation and final reclamation.

1.2 Special Notice to Pipeline Licensees

The Integrated Resource Information System (IRIS), which was launched on November 19, 2015, is designed to provide a single, integrated online system for the reporting of incidents related to the operation of wells, facilities and pipelines. This Directive establishes common standards and practices for the reporting of these incidents using IRIS.

Amendments are required to the PR to fully align the reporting requirements of the regulations to the content of this Directive. The Ministry intends to move forward with these amendments in the near term to resolve this matter. In the interim, the Ministry requests that pipeline licensees follow the practices set out in this Directive for the reporting of incidents until such time as the PR are amended.

Pipeline licensees are advised that the Ministry views compliance with this Directive as meeting the obligations of the licensee set out under section 20 (*Notification of fires, etc.*) and section 21 (*Written reports*) of the PR. No penalties pursuant to the PA or the PR will be assessed against any pipeline licensee that adheres to the provisions of this Directive.

1.3 Definitions

Blow-out: means a blow-out as defined in the *OGCR*.

Condensate: means a condensate as defined in the *OGCR*.

Emergency Response Plan or ERP: means an emergency response plan as defined in the *OGCR* or an emergency procedures manual described in section 14 of the *PR*.

Emulsion: means a mixture of two immiscible substances: a non-polar phase consisting of hydrocarbons such as crude oil or condensate, and a polar phase consisting of water or salt water. One substance (the dispersed phase) is dispersed in the other (the continuous phase).

Field office: means the regional office of the Ministry responsible for a geographic area as shown in Appendix 2.

Fire: means any unplanned fire or explosion at any well, facility, pipeline or flowline.

Flowline: means a flowline as defined in the *PA*.

Kick: means a controlled diversion of gases from a wellbore to a rig tank or flare system during drilling, workover, or completion activities.

Licensed pipeline: means a pipeline licensed pursuant to the *PA*.

Natural gas liquids: means ethane, propane, butane and pentanes-plus, or any combination of these substances.

Off-lease: means any location that is not on-lease.

Oil: means oil as defined in the *OGCR*.

On-lease: means:

- a) the area of a well or facility site that is surrounded by a berm or a dike or that is within a contoured area so that any release of liquid, semi-solid or solid is contained within the described area.
- b) if a dike or contoured area does not exist, the surveyed boundary of the surface lease for the well site or facility site; or
- c) a pipeline terminal.

Operator: means:

- a) an operator of a well or facility as defined in the *OGCR*
- b) an operator of a pipeline, including a flowline, as defined in the *PR*

Pipeline: means a pipeline as defined in the *PA*.

Pipeline Terminal: means the area within the surveyed boundary of land leased or owned by a licensed pipeline operator on which a pipeline terminal resides as it relates to, is incidental to, or used in connection with a licensed pipeline.

Product: means a product of oil and gas as defined in the *OGCA*.

Refined chemical: means any substances designated as a hazardous substance or a waste dangerous good pursuant to *The Hazardous Substances and Waste Dangerous Goods Regulations*.

Regulatory closure: means the later of the date that the applicable reclamation criteria is met by the licensee or the date that the reclamation actions were approved by the Ministry.

Salt water or Produced water: means formation water produced in association with crude oil or natural gas or any fluid that does not meet the criteria of unrestricted discharge as per Appendix 3 of *Directive S-01: Saskatchewan Upstream Petroleum Industry Storage Standards*.

Spill: is the unintentional release of any substance, fluid, gas, semi-solid or solid.

2. Incident Response Overview

2.1 Incidents Subject to this Directive

Appendix 1 sets out the types of incidents that are subject to notification and reporting requirements of this Directive. The table encompasses five general types of incidents:

- Those related to the general operation of a well, facility, flowline or pipeline;
- Those specific to the operation of a pipeline or flowline;
- Those that occur during horizontal directional drilling related to pipeline or flowline installation;
- Those that occur during the drilling or fracturing of a well; and,
- Those specific to the operation of a well or facility.

Note: It is recommended that operators address each type of incident in Appendix 1 in their ERPs and incorporate the procedures set out in this Directive in their notification and reporting plans.

2.2 Incident Response Process

An operator must carry out the following actions in relation to any of the listed incidents:

1. **NOTIFY** the Ministry in accordance with the requirements of this Directive;
2. **ACTIVATE** its Emergency Response Plan where required and take immediate steps to resolve the incident;
3. **REMEDiate** or, where necessary, reclaim the affected area to the satisfaction of the Ministry; and,
4. **SUBMIT** detailed information and reports in IRIS on the incident and the actions taken to resolve the matter.

Appendix 3 shows a flow chart of the incident response reporting process and time lines. Once an operating event occurs, the operator must first determine whether it is an incident subject to this Directive (see Appendix 1). If it is a reportable incident the operator must implement its ERP and provide immediate telephone notification where required by this Directive (see section 3.1). In addition, the operator is required to submit a notification in IRIS within five (5) business days (see section 3.2) and a detailed incident report in IRIS within 90 days (see section 3.3). Depending on the nature of the incident, the operator may be required to submit an incident reclamation report (section 4.4, 4.5 and 4.6) or a metallurgical report (section 4.7).

3. Initial Incident Notification

3.1 Immediate Telephone Notification by Operator

An operator is required to immediately notify the Ministry's Emergency Support line at 1-844-764-3637 of the discovery of any incident listed Appendix 1 except for the following types of incidents:

- Contact damage to a flowline or pipeline that does not result in a break or leak; or
- Any on-lease release of oil, condensate, emulsion or salt water that is less than 10.0 m³.

On-lease releases or contact damage that are exempt from immediate telephone notification still require Ministry notification using IRIS in accordance with section 3.2.

Note: *The Emergency Support line is available 24 hours per day, seven days per week. Operators are to call this number as soon as they discover an incident subject to immediate telephone notification.*

3.2 IRIS Notification by Operator

All incidents listed in Appendix 1 must be promptly reported in IRIS not later than five (5) business days after the discovery of the incident. This requirement is in addition to the requirement for immediate telephone notification as set out in subsection 3.1.

Note: *Operators reporting incidents into IRIS are responsible for the detailed incident reporting as outlined in section 4.3 and incident reclamation reporting as outlined in section 4.4 unless the well site, facility site or pipeline is transferred to another party. Once an incident is recorded in IRIS, the operator must comply with reporting requirement timelines set out in this Directive as established from the date of discovery.*

3.3 Notification by Person Other than an Operator

If a spill or other incident occurs while a product or waste is being transported, the owner of the product or waste must report the incident in accordance with section 3.1. and 3.2.

In the event of an incident of unknown origin, any person who witnesses or has information on the incident may provide notification to the Emergency Support line at 1-844-764-3637.

4. Incident Reporting Requirements and Time Lines

4.1 Immediate Telephone Notification

The following information is required when providing immediate telephone notification of an incident:

- the name and contact information of parties involved in the incident (e.g., well owner, well operator, contractor, etc.);
- a description of the incident location including Township, Range, Section, Legal Subdivision;
- the substance or substances involved in the incident; and
- the action undertaken to mitigate the incident.

4.2 Initial Incident Notification in IRIS

Within five (5) business days of the discovery of incident, an operator must submit the following information in IRIS:

- the name of field office responsible for the geographic area in which the incident occurred;
- the date of the incident;
- the date the incident was discovered;
- information on whether the ERP was initiated and whether the field office was notified;
- information on whether any substances were spilled or released;
- information on whether a reclamation report is required for the incident (see section 4.4);
- a brief description of the incident;
- the name of the contact, their job title, business phone number and email address who is responsible for dealing with the incident;
- the surface location of the incident (LSD-SEC-TWP-RGE-M);
- surface coordinates (latitude and longitude, in rads or degrees) described in accordance with North American Datum 83 (NAD83) with the zone indicated; and
- information about any surface water impacted by the incident and the type of surface water affected.

4.3 Detailed Incident Report

Within 90 days of the submission of the initial incident report, the operator must submit a detailed incident report in IRIS setting out the following information:

- Impacted Surface Information:
 - size of spill (m²)
 - percentage (%) off-lease impacted by the incident
- Substance Information:
 - substance type(s)
 - substance spilled or released amount(s) m³
 - substance recovered amount(s) m³
 - amount and type of other materials recovered during remedial activities
- Source Information:
 - source of the incident – well, pipeline, facility, flowline, other
 - licence identifier – licence number of the source
 - incident cause (e.g., break, malfunction, human error, act of nature, etc.)
- Attachments:
 - site sketch, photos, report, lab results

4.4 Incident Reclamation Report (IRR)

When an incident occurs, whether on-lease or off-lease, the operator is required to:

1. Immediately treat or dispose of any contaminated material;
2. Remediate, or where necessary, reclaim the impacted area to the satisfaction of the minister;
and

3. Subject to section 4.5, submit an incident reclamation report (IRR) in accordance with this section documenting the actions of the operator to resolve the incident and providing evidence demonstrating the successful resolution of the incident.

The scope and complexity of incidents will vary significantly depending on the nature of the incident (minor versus major spill events for example) and therefore, so too will the reclamation reporting requirements. For this reason, IRIS allows for the submission of more than one IRR per incident. For example, in many instances, such as a minor reportable spill, the incident may be closed with the submission of a single IRR which includes the following information:

- sampling information and analytical lab test results (prior to reclamation) as well as confirmatory sampling and test results (after reclamation)- note that sampling for on-lease spills is not required unless ordered by the minister;
- excavation details including areas/volumes, fill material details, contaminated soil disposal information (disposal location, volumes);
- details of any treatment of soil that took place;
- restoration information; and
- any additional information required by the minister.

The IRR must be submitted within 6 months of completing the reclamation. If the incident occurred on-lease at a well or facility site, the IRR does not require the signature of a certified third party. The IRR submission for all other incidents, including line breaks whether on or off lease, must be signed by a certified third party environmental reclamation professional.

Additional reporting is required where the magnitude or complexity of an incident has resulted in significant and/or long term environmental impacts. The reporting requirements generated by these types of incidents may typically include various phases of environmental site assessment (for delineation purposes), remediation reporting and periodic monitoring reports. For these types of incidents, multiple IRRs may be submitted as necessary for each of the various stages of remediation that may be required. The Ministry will provide clarity on reporting requirements and the timing of such reporting on a site specific basis where necessary.

The Ministry recognizes that on-site infrastructure will preclude the successful excavation of all impacted material in some cases. An IRR should still be submitted when the work has been completed to the extent possible at the time, but the IRR should specify that additional remediation will be required at time of site closure.

Note: *The term “reclamation” is ordinarily understood to mean the remediation of impacts at a site as well as the restoration of the site back to the original condition or a state or that is equivalent with surroundings. Depending upon whether the incident occurred on an active site or off lease, the expectations will vary from minor spill remediation to full land reclamation.*

4.5 Exceptions to IRR Submission Requirements

An IRR is not required for the following incidents:

- A fire, blow-out or kick that results only in a release of a gas;
- A release of natural gas or hydrogen sulfide gas;
- Contact damage to a flowline or pipeline that does not result in a break or leak.

4.6 Relief from IRR Submission Requirements

In addition to the general exceptions listed in section 4.5, the Ministry may relieve the operator of the requirement to submit an IRR pursuant to this Directive if it determines that a more extensive reclamation program is required to resolve the environmental impact. In these situations, the Ministry will work with the operator to develop the program and to identify any site-specific actions or reporting requirements tied to the program.

4.7 Metallurgical Report on Pipeline Failures

In the event that a pipeline or its associated equipment breaks, leaks or malfunctions, the Ministry may require that a metallurgical report or other laboratory studies be completed to determine the cause of the incident. The final written report must be submitted into IRIS and is in addition to an IRR submission.

5. Compliance and Enforcement

Failure to comply with the requirements in this Directive may result in enforcement actions under the *OGCA* (wells, facilities, flowlines) or the *PA* (licensed pipelines).

Appendix 1: Incidents Subject to Notification and Reporting

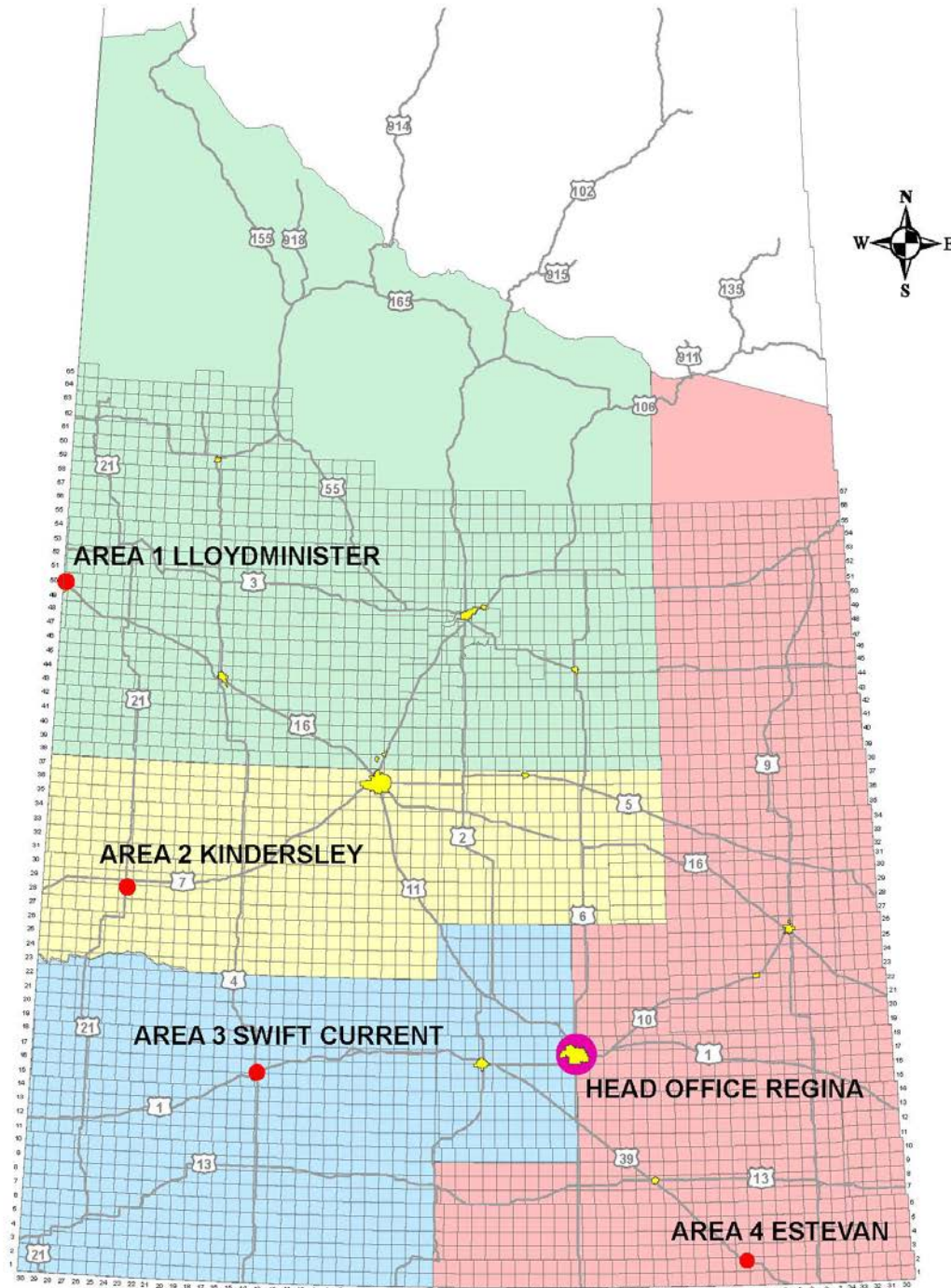
Type	Incident	Substance	Location	Description
General Field Operations	Fire	All	All	Any fires resulting from the operation of a licensed well, facility, pipeline or flowline.
	Release or Spill	Naturally Occurring Radioactive Materials (NORM)	All	Any volumes
		Oil by-products or oily produced sands	All	Any volume released that is not approved under GL97-02 ¹
	Blow-out	All	All	Any uncontrolled release of gases or fluid from a well
	Kicks	All	All	Any controlled diversion of gases or fluid from the well to a flare tank.
Pipeline or Flowline Operation	Contact Damage	All	All	Any contact damage to a flowline or pipeline
	Break	All	All	Any break to a flowline or pipeline
	Leak, malfunction of any equipment or a worker error resulting in the escape or release of a substance	Oil, salt water, condensate or other product	Off Lease	Any volume
			On Lease	All releases that are > 2.0 cubic meters (m ³) of fluid.
		Gas Containing Hydrogen Sulfide (H ₂ S)	All	Any volume at any concentration.
		Natural Gas	All	Any volumes where: <ul style="list-style-type: none"> 1. the released volume exceeds 30 000 m³; 2. the release is within a road or railway right-of-way; or 3. the release is within 150 metres of any dwelling.

Type	Incident	Substance	Location	Description
Horizontal Directional Drilling (Pipeline/Flowline Installation)	Release, Spill or Frac-Out	Drilling Fluid	All	Any volume
Drilling or Fracturing Operation	Release or Spill	Drilling wastes	All	Any volume released that is not approved under GL99-01 ²
		Fracturing Wastes	All	Any volume released that is not approved under GL2000-01 ³
Well or Facility Operation	Break, leak, malfunction of any equipment or intentional or unintentional action resulting in an escape or release	Oil, salt water, condensate, oil and gas waste, emulsion or product	On-lease	All volumes $\geq 2.0 \text{ m}^3$ or 2000 liters requires reporting but only volumes $\geq 10.0 \text{ m}^3$ or 10000 liters require notification
			Off-lease	Any volume
		Refined Chemical	On-lease	All volumes $\geq 0.5 \text{ m}^3$ or 500 liters
	Escape or Release	Gas Containing H ₂ S	All	Any volumes where: <ol style="list-style-type: none"> The concentration of H₂S exceeds 0.1 % or 1000 ppm or 1.0 mole H₂S/kilomole from solids, liquids or gas during production or transportation (truck or transmission via pipeline/flowline); The released volume poses a danger to human health, domestic animals, wildlife or the environment.

Note : Please refer to the following guidelines for reference in Appendix 1.

1. GL 97-02. Guideline for the Application of Oily Byproducts to Municipal Roads in Saskatchewan
2. GL 99-01. Saskatchewan Drilling Waste Management Guideline
3. GL 2000-01. Saskatchewan Hydraulic Fracturing Fluids and Propping Agents Containment and Disposal Guidelines

Appendix 2: Field Office Locations and Areas



Appendix 3: Incident Reporting Flow Chart

