



SAFETY PLAN GUIDELINES AND INTERPRETATION NOTES

**OFFICE OF THE REGULATOR
OF OIL AND GAS OPERATIONS**

Safety Plan Guidelines and Interpretation Notes

CONTENTS

1. Introduction	1
2. Purpose and Scope	4
3. Format	6
4. Management System Linkages.....	7
5. Content of the Safety Plan	9
5A. General.....	9
5B. Identification of Hazards and Evaluation of Risks	12
5C. Emergency Preparedness and Response	14
5D. Structures, Facilities, Equipment and Systems	15
5E. Organizational Structure	17
5F. Contractors and Supply Chain Management	19
5G. Ice Management	21
5H. Monitoring Compliance and Measuring Performance.....	22
5I. Awareness, Competence and Training	25
5J. Management of Change.....	28
6. Reporting Incidents and Near Misses	29
7. Record Keeping	31
8. Regulator’s Approval	33

Safety Plan Guidelines and Interpretation Notes

1. INTRODUCTION

Purpose	The <i>Safety Plan Guidelines and Interpretation Notes</i> (Guidelines) provide guidance to applicants and operators on the development and maintenance of Safety Plans.
Legislative Requirements	<p>The legislative requirements for Safety Plans are:</p> <ul style="list-style-type: none">• Section 5 of the <i>Oil and Gas Drilling and Production Regulations</i> (OGDPR) states that applicants for an Operations Authorization must develop a management system that includes safety components.• Section 6(c) of the OGDPR states that an application for an Operations Authorization must include a Safety Plan.• Section 6(j) of the OGDPR states that an application for an Operations Authorization must include contingency plans, including emergency response procedures.• Section 8 of the OGDPR describes the required contents of a Safety Plan.• Section 19 of the OGDPR requires operators to take “all reasonable precautions to ensure safety” and lists specific actions to be taken.• Parts 3 through 10 of the OGDPR contain other safety-related requirements.• Section 75 of the OGDPR addresses incident and near-miss reporting requirements.• Sections 77 and 80 of the OGDPR describe record keeping requirements.• Section 15 of the <i>Oil and Gas Operations Act</i> (OGOA) requires applicants to make declarations with respect to the appropriateness of their equipment, installations and operating procedures and the qualifications of their personnel.
Minimum Requirements	The Guidelines set out the minimum requirements for the content of Safety Plans. Applicants may provide additional or different content, where that content is demonstrated to meet or exceed the same requirements for the protection of human safety.
Regulations are Paramount	Where a conflict exists between the Guidelines and the OGDPR, the OGDPR are paramount.

Safety Plan Guidelines and Interpretation Notes

Regulator's Approval Required

Safety Plans are used to consider the safety of the work or activity before an Operations Authorization is issued (as required under section 12 of the *Oil and Gas Operations Act* (OGOA)). Safety Plans are also used to assess the applicant's declarations under section 15 of OGOA.

Safety Plans are reviewed by the Regulator during the process of reviewing an application for an Operations Authorization. An approved Safety Plan is required before the Regulator can issue an Operations Authorization.

Objectives

The objectives of the Guidelines are to:

- Support compliance with the OGDPR;
- Ensure that operators take steps to reduce risk to a level that is as low as reasonably practicable;
- Be consistent with the requirements of the National Energy Board, the other regulator responsible for administering the OGDPR in the Northwest Territories, where appropriate; and
- Reflect the context of oil and gas activities in the Regulator's jurisdiction.

Authority

These Guidelines are issued by the Regulator under section 18 of the *Oil and Gas Operations Act* (OGOA).

Regulator's Discretion

Application of these Guidelines is subject to the Regulator's discretion under OGOA.

Scope

The Guidelines apply to all Safety Plans submitted to the Regulator, effective January 1, 2019, unless otherwise required by the Regulator.

Safety Plan Guidelines and Interpretation Notes

Jurisdiction



Other Regulatory Requirements

Oil and gas works or activities carried out in OROGO’s jurisdiction may also be subject to the requirements of other regulators.

Contents

The Guidelines are organized to reflect the requirements of the OGDPR and OGOA as follows:

Section	Contents	Page
2	Purpose and Scope	4
3	Format	6
4	Management System Linkages	7
5	Content of the Safety Plan	9
6	Reporting Incidents and Near Misses	29
7	Record Keeping	31
8	Regulator’s Approval	33

Safety Plan Guidelines and Interpretation Notes

2. PURPOSE AND SCOPE

Contents	<p>This section describes the function of a Safety Plan, including:</p> <ul style="list-style-type: none">• Purpose of a Safety Plan;• Scope of a Safety Plan; and• Reflecting the complexity of the activity.
Objective	<p>The Safety Plan is an operator's plan for the proposed project, the scope of which should include contractors and their personnel. The Safety Plan describes responsibilities and expectations for safety associated with an authorized activity.</p>
Purpose of a Safety Plan	<p>A Safety Plan should include statements that describe its purpose and demonstrate that the operator understands the relationship between the Safety Plan and operator and contractor management systems, legal requirements, and the work to be completed.</p> <p>The Safety Plan should serve as a summary and reference document that describes and provides a road map to all safety related processes and documents. It should summarize and refer to the safety management elements of the management system that apply to the activity. The Safety Plan is not intended to describe all details of an operator's safety management system or integrated management system.</p>
Scope of a Safety Plan	<p>The scope statement should describe what is covered and what is excluded. The scope should describe the typical offshore and onshore work and activities to be conducted (e.g. installations, vessels, support craft), as well as critical onshore support processes, including but not limited to logistics and program administration. The scope should be consistent with the scope description of the proposed activities required by paragraph 6(a) of the OGDPR.</p> <p>The Safety Plan is likely to be limited by the operational boundaries of the work or activity, but it may also be limited in time (temporal scope). The Safety Plan should identify the specific aspects of the planned work or activities to which the Safety Plan will be applied, including any particular limitations to its applicability. This should include, as applicable, works and activities related to pre-mobilization, mobilization, exploration, drilling, construction, installation, operations, decommissioning and abandonment, and post-abandonment.</p>

Safety Plan Guidelines and Interpretation Notes

Reflecting the Complexity of the Activity

The breadth and depth of a Safety Plan is a function of work activity complexity and risk. A Safety Plan for a low hazard, low risk, single activity, would likely not need to be as lengthy or complex as a plan for a high hazard, high risk multi-faceted project.

Safety Plan Guidelines and Interpretation Notes

3. FORMAT

Contents	This section describes the formatting requirements for a Safety Plan and addresses Integrated Health, Safety and Environmental Management Systems (IHSEMS).
Objective	The Safety Plan is organized appropriately.
Format of a Safety Plan	<p>There are no specific requirements for the format of a Safety Plan. However, an operator should consider the following when organizing a Safety Plan:</p> <ul style="list-style-type: none">• The Safety Plan document forms part of the operator's management system and should be consistent with the overarching management system;• The Safety Plan must adequately address the requirements outlined in the OGDPR;• The Safety Plan documents must describe safety hazards, risks and mitigations that have been identified for the proposed work or activity; and• For the production phase, the Safety Plan must reflect commitments to safety made in the approved Development Plan.
IHSEMS	<p>An operator may have an IHSEMS. If so, the IHSEMS may be submitted, but it must meet the requirements of sections 8 and 9 of the OGDPR.</p> <p>If an IHSEMS is submitted, the operator must also submit a concordance table, relating the parts of the IHSEMS to the requirements of the OGDPR.</p>

Safety Plan Guidelines and Interpretation Notes

4. MANAGEMENT SYSTEM LINKAGES

Contents	<p>This section describes the links between the Management System and the Safety Plan. It addresses:</p> <ul style="list-style-type: none">• Management system structure;• Separate Safety Management Systems;• The operator’s safety policy; and• References to other documents.
Objective	<p>The Safety Plan is a component of the operator’s Management System and provides assurance that the operator can appropriately manage safety when conducting a specific work or activity.</p>
Requirements	<p>The Management System integrates operations and technical systems with the management of financial and human resources to ensure compliance with OGOA and with the OGDPR (section 5(1) of the OGDPR).</p> <p>The Management System includes the policies on which the system is based (for example, the safety policy) (section 5(2)(a) of the OGDPR).</p> <p>A Safety Plan must include “a summary of and references to the management system that demonstrate how it will be applied to the proposed work or activity and how the duties set out in these regulations with regard to safety will be fulfilled” (section 8(a) OGDPR).</p>
Management System Structure	<p>The operator may determine the structure of the Management System taking into account the purpose of the system and required elements identified in section 5 of the OGDPR. The structure and the scope of the Management System may be broader than the requirements in section 5, but must meet those requirements.</p>
Separate Safety Management System (SMS)	<p>An operator may have a separate Safety Management System (SMS), or manage the safety elements of its activity through a general Management System.</p>

Safety Plan Guidelines and Interpretation Notes

Reference to Standard

For the safety related aspects of an operator's Management System, the operator may refer to the Canadian Standard for Occupational Health and Safety Management, CAN/CSA-Z10000-6. The standard is a useful tool for the development of safety management systems and associated plans.

Safety Policy: Linking the Management System and the Safety Plan

The operator's safety policy links the Management System and the Safety Plan. The safety policy establishes the basic principles applicable to the planned work or activities to be conducted. It sets the tone for safety responsibility and required performance.

Typically, the safety policy in the operator's Management System would be applied to the planned work or activities. However, an activity-specific safety policy may be defined instead.

References to Other Documents

The Safety Plan should refer to the specific plans, procedures, work instructions, operating manuals and other documents intended to direct the work of personnel at the installation. These documents may be at varying levels of authority within the Management System and should be written appropriately to control work activities so that the following can be achieved:

- The work or activity is conducted in a manner that conforms to the safety policy;
- Safety mitigation commitments are met; and
- Operator's objectives and targets are met.

As necessary, the Safety Plan should refer to documents at higher or lower levels in the operator's management system. Higher-level documents may describe safety management policies and processes. Lower level documents may describe general procedures, specific operations procedures, activity-specific work procedures and work instructions, equipment manuals, personnel allocations and resource allocations to satisfy the safety obligations of the operator.

5. CONTENT OF THE SAFETY PLAN

5A. General

Contents This section provides an overview of the contents of a Safety Plan and specifically addresses:

- The level of detail required;
- Offshore drilling operations;
- Onshore drilling operations;
- Commitments by the operator;
- Adopted codes and standards; and
- Legal requirements.

Overview of Safety Plan Contents An effective Safety Plan should incorporate the following elements:

- Procedures, practices, resources, key safety-related activities and monitoring measures to ensure the safety of the proposed work or activity;
- Means to comply with safety-related requirements of legislation (statutes and regulations);
- Safety measures identified through the hazard identification and risk evaluation process; and
- Safety measures identified as part of a safety program needs assessment or safety commitments made as part of an application, as the case may be.

The legislation and regulations require that an operator address all of the aspects of planned work or activities that can have potential impacts on safety, whether they are specifically identified in these guidelines or not. An operator should be aware that a Safety Plan should be responsive to other sections of the OGOA and its associated regulations as applicable.

Where the operator has developed detailed procedures or work instructions (or detailed procedures or work instructions have been developed by their contractors and accepted by the operator) to satisfy their statutory safety duties, the Safety Plan should summarize the content of these documents rather than repeat the content.

The Safety Plan should explain the operator's due diligence, overall coordination and oversight of the work or activity, as well as appropriate installation-specific information.

Safety Plan Guidelines and Interpretation Notes

The submitted material must meet the minimum requirements for information content as laid out in the OGDPR and must contain sufficient detail to allow a thorough assessment of the risk management measures associated with the proposed program.

The Safety Plan should reflect the actual conditions encountered in the field. As such, the Safety Plan should be periodically reviewed and revised by the operator to reflect field conditions once authorized operations commence.

Level of Detail The Safety Plan must contain sufficient detail to be understandable and useful. The Safety Plan is not a stand-alone document and should refer to rather than duplicate detailed information contained elsewhere in the Management System.

Offshore Drilling Operations In the case of a drilling operation using a Mobile Offshore Drilling Unit (MODU), an operator should append to the Safety Plan a valid and current Health, Safety and Environmental (HSE) Case developed in accordance with the International Association of Drilling Contractors (IADC) *HSE Case Guidelines for Mobile Offshore Drilling Units* (see the IADC website: www.iadc.org).

Just as Safety Plans for drilling with a MODU can take advantage of an IADC HSE Case, operator Safety Plans for activities that involve marine vessels should align with and take advantage of the vessel's International Safety Management (ISM) certification and associated documentation. An operator should ensure that vessels have a valid and current ISM certification and project specific risks, which may fall outside the ISM system, are appropriately managed. Safety Plans should reflect these expectations and may build on, or summarize and reference appropriate ISM documentation rather than repeat it.

Onshore Drilling Operations In the case of an onshore drilling operation, an operator may append to the Safety Plan an HSE Case developed in accordance with the IADC *HSE Case Guideline for Land Drilling Units*. An operator that does not submit a supporting HSE Case may find the IADC guidelines helpful in developing documentation to demonstrate that their Management System is comprehensive and effective in identification of hazards, selection of mitigations and in meeting risk reduction and control expectations and regulatory requirements.

Safety Plan Guidelines and Interpretation Notes

Commitments by the Operator

The Safety Plan should reference and be responsive to commitments that the operator has made, with respect to safety, as part of the application process prior to work or activities being undertaken. This may include, but is not limited to:

- Commitments made in an application for a Development Plan Approval; and
- Commitments made in the application for authorization of a work or activity (Operations Authorization).

Adopted Codes and Standards

The Safety Plan should list industry guidance and other codes and standards that the operator has adopted related to the work or activity (for example, Energy Safety Canada industry recommended practices) unless those standards are already incorporated in legislation.

The operator should be aware that, where they adopt a code or standard as part of the Safety Plan, compliance is enforceable.

Legal Requirements

The Safety Plan should summarize and reference the applicable legal requirements that the planned work or activities are to comply with in respect of its safety obligations. This should include all Canadian, flag and international requirements as may be applicable. The Safety Plan should summarize and reference possible conflicts between regulatory requirements. The sections of OGOA and the OGDPR relevant to the Safety Plan are listed in Section 1 of these Guidelines.

Safety Plan Guidelines and Interpretation Notes

5B. Identification of Hazards and Evaluation of Risks

Contents This section describes how the Safety Plan should address the identification of hazards, the evaluation of risk and risk mitigation. It addresses:

- The concept of “as low as reasonably practicable” (ALARP);
- Operations and maintenance procedures;
- The ongoing nature of the process.

Objective The Safety Plan provides:

- A high-level understanding of the operator’s processes for identifying hazards and for evaluating and managing the associated risks for the type of work or activity proposed; and
- Detailed information for the specific work or activity including a summary of the studies undertaken to identify hazards and assess risk and a description of the hazards that were identified.

Requirements A Safety Plan must:

- Summarize the studies undertaken to identify hazards and to evaluate safety risks related to the proposed work or activity (section 8(b) of the OGDPR);
- Describe the hazards that were identified and the results of the risk evaluation (section 8(c) of the OGDPR); and
- Summarize the measures to avoid, prevent, reduce and manage safety risks (section 8(d) of the OGDPR).

As Low as Reasonably Practicable While the concept “as low as reasonably practicable” (ALARP) is not used in the OGDPR, this concept has been used for a number of years by industry and numerous agencies in considering safety matters and reduction of risk. Industry may demonstrate incorporation of ALARP into their risks reduction and associated mitigating measures through a number of means, including a combination of qualitative analysis, quantitative analysis and good industry practice.

Operations and Maintenance Procedures The Safety Plan should demonstrate that comprehensive system procedures and practices are in place to guide all hazardous operations and their interaction with one another. Hazardous operations include drilling, well operations, production and process operations, helicopter operations, materials handling, marine, maintenance, construction, installation operations etc.

Safety Plan Guidelines and Interpretation Notes

The Safety Plan should:

- List, summarize and reference key operations and safety procedures; and
- Explain and reference processes that describe how operational procedures are developed, monitored, controlled and maintained.

The Safety Plan should identify and summarize the processes in place to control and coordinate hazardous work and reference applicable procedures. These should include work permit systems, shift and tour hand-over procedures, alarm and safety system inhibit control, simultaneous operations procedures, planning meetings and planning activities at all levels of the organizations, e.g. tool box talks, pre-task risk assessments, communications procedures, etc.

The Safety Plan should identify routine hazard control measures such as planned inspections, identification and control of personal protective equipment, machine guards and other barriers, control of hazardous materials, occupational hygiene, etc.

Ongoing Process

The processes for identification of safety hazards and risks, whether on a situation-specific or project wide basis, should not only occur at the authorization / approval phase. Operators must have processes in place which assure that hazards are identified and risk is assessed at all levels of the organization as work proceeds. Hazards should be re-assessed at higher levels as project assumptions change or experience is obtained, from the exploration and development phase through to project completion. The Safety Plan should provide an explanation of how risk is assessed and re-assessed at all levels through the life of the proposed work or activity.

Safety Plan Guidelines and Interpretation Notes

5C. Emergency Preparedness and Response

Contents	<p>This section describes how the Safety Plan should address emergency preparedness and response, including:</p> <ul style="list-style-type: none">• Plans and procedures; and• Testing and exercises.
Objective	<p>The Safety Plan should identify potential hazards, abnormal situations, emergencies, incidents and accidents that could have an impact on safety and for which contingency plans, including emergency response procedures, have been developed.</p>
Requirements	<p>An application for authorization must include contingency plans, including emergency response procedures, to mitigate the effects of any reasonably foreseeable event that might compromise safety or environmental protection (section 6(j) of the OGDPR).</p> <p>Operators must ensure that plans to deal with potential hazards are in place (section 19(h) of the OGDPR). Potential hazards include abnormal conditions.</p>
Plans and Procedures	<p>The Safety Plan should refer to the appropriate emergency plans and procedures.</p>
Testing and Exercises	<p>The Safety Plan should refer to the Operator's plans to test and exercise its emergency preparedness plans and response equipment.</p>

Safety Plan Guidelines and Interpretation Notes

5D. Structures, Facilities, Equipment and Systems

Content	<p>This section describes how structures, facilities, equipment and systems critical to safety should be addressed in the Safety Plan, including:</p> <ul style="list-style-type: none">• The methodology used;• Fitness for purpose;• Third party certification schemes; and• Asset integrity management.
Objective	<p>Safety critical structures, facilities, equipment and systems are clearly described in the Safety Plan.</p>
Requirements	<p>A Safety Plan must contain a list of all structures, facilities, equipment and systems critical to safety and a summary of the system in place for their inspection, testing and maintenance (section 8(e) of the OGDPR).</p> <p>Operators must declare “the equipment and installations that are to be used in the work or activity to be authorized are fit for the purposes for which they are to be used” (section 15(1)(a) of OGOA).</p>
Methodology	<p>The methodology used to develop the list of safety critical items should be summarized and then referenced in the Safety Plan, including links to the overall risk assessment and design processes. As this safety critical item list may be quite lengthy and electronically controlled, it may not be practical to include it directly in the Safety Plan. Consequently, the Safety Plan may include some appropriate abbreviated form of this list along with details of how the operator and/or installation owners maintain the full list.</p>
Fitness for Purpose	<p>The Safety Plan shall summarize and then make reference to the processes and procedures or how fitness for purposes has been determined for safety critical items.</p>

Safety Plan Guidelines and Interpretation Notes

Third Party Certification Schemes for Offshore Installations

For offshore installations, an operator may rely, to an appropriate degree, on the Certificate of Fitness and/or Flag State certificates as third party verification of specific regulatory requirements, including the integrity assurance of safety critical items. However, these certificates do not relieve the operator of overall accountability for the integrity of safety critical items. Consequently, for offshore installations, the Safety Plan should explain how these third party certification schemes fit into the operator's overall due diligence process and demonstrate how the operator will use third party verification to complement internal processes.

Asset Integrity Management

The Safety Plan should provide a high-level overview of asset integrity management to complement the specific information provided on safety critical equipment. Where an operator has developed processes and procedures for managing the integrity of "Safety and Environmentally Critical Systems," the Safety Plan need not repeat these in detail but may rather provide an overview explanation and refer to the specific documents.

Safety Plan Guidelines and Interpretation Notes

5E. Organizational Structure

Content	<p>This section describes how the organizational structure for the proposed work or activity should be addressed in the Safety Plan. It addresses:</p> <ul style="list-style-type: none">• Resources, roles, responsibilities and authority;• Coordinating management and operations; and• Commitment, leadership and participation.
Objectives	<p>Individuals responsible for the design and implementation of the Safety Plan are identified, including those responsible for the allocation and management of financial and human resources, as required, to achieve the purpose of the Management System and of the Safety Plan.</p> <p>The relationships between safety-critical positions are clear.</p>
Requirements	<p>A Safety Plan must contain a description of the organizational structure for the proposed work or activity and the command structure on the installation. The description must explain the relationship between the organizational structure and the command structure (section 8(f)(i) of the OGDPR).</p> <p>A Safety Plan must provide the contact information and position of the person accountable for the Safety Plan and of the person responsible for implementing it (section 8(f)(ii) of the OGDPR).</p>
Resources, Roles, Responsibilities and Authority	<p>Identifying the position(s) accountable for the Safety Plan includes indicating who within the company has responsibility and authority for its implementation, ongoing maintenance, performance monitoring and continuous improvement. The Safety Plan should contain organization charts showing reporting relationships for both line management roles and supporting safety staff functional roles. The Safety Plan should identify safety-related accountabilities and responsibilities of all senior managers and other key personnel for both the operator and key contractors. The Safety Plan should describe, at an operational level, how installation management and personnel will implement the Safety Plan on a day-to-day basis.</p>
Coordinating Management and Operations	<p>The arrangements for coordinating the management and operations of the proposed work or activity among the owners of the installation, the contractors, the operator and others as applicable are also a requirement of the Management System under paragraph 5(2)(j) of the OGDPR. With regard to contractors, the operator should allocate</p>

Safety Plan Guidelines and Interpretation Notes

appropriate personnel and resources to ensure that the contractors it employs can support the operator's applicable regulatory obligations and meet the requirements of the Safety Plan.

Note that, ultimately, it is the operator's responsibility to meet applicable legislative and regulatory requirements.

Commitment, Leadership and Participation

The Safety Plan should describe how the leadership of the organization will demonstrate safety commitment, oversight and visible participation.

The Safety Plan should describe how workers will be:

- Encouraged and supported to participate in the execution and ongoing evolution of the Safety Plan; and
- Engaged in safety management activity, such as the worker's right to know, right to participate and right to refuse.

The right to know includes the right to be aware of all credible hazards and the systems in place to mitigate risks associated with these hazards. The right to participate includes not only such established forums as a Joint Occupational Health and Safety Committee, but also the more general right for workers to have input into safety management, including the Safety Plan. The Safety Plan should include a clear statement reiterating the right to refuse dangerous work and outlining the process workers follow to exercise this right as required by the *Safety Act*.

Safety Plan Guidelines and Interpretation Notes

5F. Contractors and Supply Chain Management

Contents	<p>This section describes the requirements for addressing the use of contractors and supply chain management in the Safety Plan. It addresses:</p> <ul style="list-style-type: none">• Operator responsibilities;• The selection of contractors;• The operator / contractor relationship; and• Supply chain management.
Objective	<p>The Safety Plan clearly identifies the roles and responsibilities of contractors and describes how the operator and contractors will work together to maintain safety of the work or activity.</p> <p>The Safety Plan identifies appropriate supply chain management procedures.</p>
Requirements	<p>A Safety Plan must include a description of the organizational structure for the proposed work or activity and the command structure on the installation, explaining the relationship between the different positions (section 8(f) of the OGDPR).</p>
Operator Responsibility	<p>The operator is responsible to ensure that contractors it employs meet applicable regulatory requirements for safety. Contractors' activities must be conducted within the scope of work described by the operator's Safety Plan.</p> <p>The operator is responsible to allocate appropriate personnel and resources to ensure that contractors it employs meet the applicable regulatory requirements.</p>
Selection of Contractors	<p>The Safety Plan should:</p> <ul style="list-style-type: none">• Identify processes that describe how contractors are selected, including:<ul style="list-style-type: none">○ the significance placed upon safety performance and competence; and○ an explanation of how the operator measures and verifies these factors; and• Explain the coordination or integration of respective safety management systems, including contract provisions for performance monitoring.

Safety Plan Guidelines and Interpretation Notes

Operator / Contractor Relationship

The Safety Plan should explain operator and contractor relationships and explain operator oversight and coordination of these matters. This includes an explanation of how the operator's overall "processes for conducting periodic reviews or audits of the [management] system and for taking corrective actions where reviews or audits identify areas of non-conformance with the system and opportunities for improvement", as required by paragraph 5(2)(i) of the OGDPR, will apply to the activity.

The Safety Plan may describe the links to the operator's Management Systems or some combination of the operator's system and that of key contractors. For example, the operator's safety management system would typically apply to an exploration-drilling program with regard to the assessment of hazards, the selection of contractors and overall project coordination. However, hazards specific to a drilling installation and the occupational safety of personnel onboard the drilling installation are usually managed by the drilling installation owner's safety management system, which is vetted and monitored by the operator.

Supply Chain Management

The Safety Plan should identify processes to evaluate products, supplies, equipment, new materials and other goods prior to purchase. These processes should identify and assess the hazards and risks associated with the use of these goods (e.g. chemicals) and establish mitigation (such as equipment, procedures and monitoring) to eliminate or control these hazards and risks.

Safety Plan Guidelines and Interpretation Notes

5G. Ice Management

Content	This section describes how the Safety Plan should address ice management.
Objective	The Safety Plan should appropriately address ice management.
Requirements	If the possibility of pack sea ice, drifting icebergs or land-fast sea ice exists at the drill or production site, a Safety Plan must include the measures to address the protection of the installation, including systems for ice detection, surveillance, data collection, reporting, forecasting and, if appropriate, ice avoidance or deflection (section 8(g) of the OGDPR).

Safety Plan Guidelines and Interpretation Notes

5H. Monitoring Compliance and Measuring Performance

Content	<p>This section describes how the Safety Plan should address monitoring compliance and performance measurement, including:</p> <ul style="list-style-type: none">• Safety performance information;• Continuous improvement;• Objectives, targets and limits;• Performance indicators;• Auditing; and• Managing nonconformities.
Objective	<p>The Safety Plan should:</p> <ul style="list-style-type: none">• Support continuous improvement;• Identify how the operator will monitor and ensure compliance with the plan; and• Identify which performance indicators the operator will measure and track.
Requirements	<p>A Safety Plan must include a description of the arrangements for monitoring compliance with the plan and for measuring performance in relation to its objectives (section 8(h) of the OGDPR).</p>
Safety Performance Information	<p>The operator may collect or receive safety performance information in a number of ways:</p> <ul style="list-style-type: none">• Compliance monitoring;• Incident and near miss reporting and investigation;• Audits; and• Monitoring of leading and lagging indicators, etc.
Continuous Improvement	<p>An operator should seek opportunities for improvement in safety.</p> <p>The Safety Plan should describe how experience gained from operations will be reviewed and used to improve the Safety Plan and the safety management system. Where the operator has a separate procedure for continuous improvement, the Safety Plan may refer to that procedure. The Safety Plan should be a dynamic document that is updated from time to time to reflect the operator's learning, changes in industry standards, and changes in regulatory requirements.</p>

Safety Plan Guidelines and Interpretation Notes

Link to Annual Safety Report

The Safety Plan should refer to the annual safety report (required under section 87 of the OGDPR) and that report should refer back to the Safety Plan.

Objectives, Targets and Limits

The Safety Plan should describe:

- The safety goals; and
- How the operator will:
 - Monitor compliance with the Safety Plan;
 - Measure effectiveness of the Safety Plan; and
 - Measure safety performance, including safety of personnel, process safety and integrity of the installations.

Performance Indicators

The Safety Plan should summarize and reference the leading and lagging performance indicators that the operator will use to steward the safety goals, including those for asset integrity, process safety and human factors.

Auditing

The Safety Plan should identify the type of audits (internal and external) to be performed during the planned work or activities related to safety performance, the nature and extent of such audits and how the corrective and preventive actions for non-compliance are dealt with and communicated to senior management. The Safety Plan should refer to the operator's procedures for managing and conducting their auditing program.

The operator may elect to have an external auditor assess compliance with legislation and regulations and assess the Management Systems that achieve compliance (or components of these systems, e.g. safety). These audits may be conducted to determine conformance to the operator's internal policies / model or to an external criteria such as a standard. The Safety Plan should identify any procedures relevant to audit of the Safety Plan, including implementation of corrective actions.

Managing Nonconformities

The Safety Plan should summarize, and then make reference to, the procedure(s) to identify and deal with nonconformities or problems related to procedures and equipment that have caused or could cause poor safety performance. Such procedures should also address communication, how corrective and preventative action(s) will be taken to address such nonconformities and how the effectiveness of corrective and preventative actions will be assessed after an appropriate implementation period.

Safety Plan Guidelines and Interpretation Notes

Remedial actions resulting from periodic reviews or audits and incident investigations may include changes to policies, plans, procedures, work instructions or equipment. The Safety Plan should be reviewed and revised to reflect these changes as necessary.

Safety Plan Guidelines and Interpretation Notes

5I. Awareness, Competence and Training

Contents This section describes the requirements for awareness, competence and training in the Safety Plan, including:

- Awareness of the safety plan and obligations;
- Communications;
- Establishing competency requirements; and
- Assuring competence.

Objective Operators provide for safety awareness and competence assurance, including both training and competency assessment, among all personnel and document their approach in the Safety Plan.

Requirements Operators must ensure:

- A sufficient number of trained and competent individuals are available to complete the authorized work or activities and carry out any work or activity safely and without pollution (section 19(l) of the OGDPR);
- All personnel have, before assuming their duties, the necessary experience, training and qualifications and are able to conduct their duties safely, competently and in compliance with these regulations (section 72 of the OGDPR); and
- Records of the experience, training and qualifications of all personnel are kept and made available to the Regulator upon request (section 72 of the OGDPR).

Section 15(1)(a) of OGOA requires applicants for authorizations to formally declare that the equipment and installations to be used are fit for the purposes for which they are to be used, the operating procedures relating to them are appropriate for those uses and the personnel who are to be employed in connection with them are qualified and competent for their employment.

Awareness of the Safety Plan and Safety Obligations The Safety Plan should summarize and reference the procedure(s) in place to make persons aware of the existence of the Safety Plan and their obligations with respect to safety. This awareness should be communicated to all levels of the organization, including contractors. All personnel should be aware of:

- The organization's commitment to safety and operating in a responsible manner;
- The potential hazards of the work or activity and the individual's role in controlling those hazards;

Safety Plan Guidelines and Interpretation Notes

- The responsibilities of each individual to meet safety objectives and achieve conformity with safety policies and procedures; and
- The potential consequences of departure from specified procedures.

Communication The information contained within the Safety Plan should be communicated and made available to all project personnel, so that they are aware of their responsibilities and what is expected of them concerning safety.

Safety hazards, risks and mitigations associated with a work or activity, the safety elements of the Management System, targets and goals should be communicated as appropriate through all levels of the organization and to appropriate external stakeholders. The Safety Plan should refer to the policies, plans and procedures for communicating safety matters.

Where the operator has made commitments during the safety study or risk assessment process or the Development Plan approval process to provide safety related documents to the public, the procedures that will be used to satisfy this commitment should be summarized and then referenced in the Safety Plan.

Establishing Competency Requirements

The Safety Plan should summarize and then make reference to:

- Processes that establish candidate competency requirements at time of hire, noting how operator and contractor personnel are selected (e.g. objective criteria of experience, training and other qualifications);
- The medical standards and associated processes used to assess personnel's physical ability to work in the "offshore" environment and in specific positions (e.g. American Petroleum Institute (API) medical standards for crane operators) without posing an undue risk to themselves or others;
- The requirements and qualifications for core offshore and onshore positions. This includes personnel performing key support roles, such as helicopter pilots and vessel Masters. The operator should set project-specific training and qualification requirements based on project specific activities, roles, hazards and risks;
- The procedures and processes for determining safety critical tasks and the competency assurance process for personnel performing those tasks, including how the minimum number of personnel required for safety critical roles was determined for

Safety Plan Guidelines and Interpretation Notes

the activity and the Management System reference document where those numbers have been set;

- Succession plans and other planning and monitoring procedures to manage ongoing requirements for qualified and competent personnel in safety critical roles;
- Processes that describe how required professional, marine and trade certifications will be determined and how they will be maintained;
- When specialized training is required because of the specific safety aspects of a planned work or activity; and
- Procedures for determining the specific training leaders are required to receive in matters related to safety, risk management and their role in the operator's management system.

Assuring Competence

The application of a systematic approach to the assurance of competence, which considers hiring and placement processes, training, certification, competency assessment, documentation, audit, review and feedback, is inherent in the legislation.

The Safety Plan should explain how the operator has ensured that personnel are trained and competent to perform their duties and provide references to more detailed information as may be necessary for audit. This may include personnel involved in the planning and shore based management of projects as well as those involved in offshore execution.

The Safety Plan should summarize and then make reference to the procedures followed to ensure that personnel are trained in operating and maintenance processes, including simulator training where appropriate.

The Safety Plan need not include a detailed listing of training and competency requirements.

Safety Plan Guidelines and Interpretation Notes

5J. Management of Change

Contents	This section describes the requirement to address change management procedures in the Safety Plan.
Objective	A documented change management process is part of the Safety Plan.
Requirements	Section 15(1)(b) of OGOA requires applicants for authorizations to formally declare that the applicant shall ensure, so long as the work or activity that is authorized continues, that the equipment and installations continue to be fit for the purposes for which they are used, the operating procedures continue to be appropriate for those uses, and the personnel continue to be qualified and competent.
Change Management Procedures	The Safety Plan should summarize and refer to the operator's management of change procedures applicable to the work or activity. This includes processes that ensure the revision, distribution and control of associated documents (see section 7).

Safety Plan Guidelines and Interpretation Notes

6. REPORTING INCIDENTS AND NEAR MISSES

Content	<p>This section describes the requirements for the reporting of incidents and near misses. It addresses:</p> <ul style="list-style-type: none">• Reporting procedures;• The reporting line; and• Other regulators.
Objectives	<p>The Safety Plan explains and identifies the procedures for the reporting of safety incidents and near misses both internally and to the Regulator.</p>
Requirements	<p>Operators must notify the Regulator of any incident or near-miss as soon as the circumstances permit (section 75(1)(a) of the OGDPR).</p>
Definitions	<p>An incident is:</p> <ul style="list-style-type: none">(a) an event that causes:<ul style="list-style-type: none">(i) a lost or restricted workday injury,(ii) death,(iii) fire or explosion,(iv) a loss of containment of any fluid from a well,(v) an imminent threat to the safety of a person, installation or support craft or(vi) pollution(b) an event that results in missing person, or(c) an event that causes:<ul style="list-style-type: none">(i) the impairment of any structure, facility, equipment or system critical to the safety of persons, an installation or support craft, or(ii) the impairment of any structure, facility, equipment or system critical to environmental protection. <p>A near miss is an event that would likely cause an event set out in paragraph (a) of the definition “incident” but does not, due to particular circumstances.</p> <p>Pollution is the introduction into the natural environment of a substance or form of energy outside the authorized limits, including spills.</p>

Safety Plan Guidelines and Interpretation Notes

Reporting Procedures	Reporting procedures should include the investigation of all such incidents or near-misses to find the underlying or root causes, the identification, implementation and tracking of remedial actions to prevent future recurrence of the incident or similar incidents.
Reporting Line	Report incidents and near misses to OROGO's 24/7 incident reporting line: 1-867-445-8551.
Link to Safety Plan Updates	Remedial actions resulting from incident investigations may include changes to policies, plans, procedures, work instructions or equipment. The Safety Plan should be reviewed and revised to reflect these changes as necessary.
Other Regulators	Other regulators may also have reporting requirements that apply to works or activities in OROGO's jurisdiction.

Safety Plan Guidelines and Interpretation Notes

7. RECORD KEEPING

Content This section describes the requirements for record keeping as part of a Safety Plan. It addresses:

- Maintenance of records; and
- Documentation and document control.

Objectives Appropriate safety-related records are available to the Regulator and safety-related documents are appropriately controlled.

Requirements Operators must keep records of:

- The location and movement of support craft, the emergency drills and exercises, incidents, near-misses, the quantities of consumable substances that are required to ensure the safety of operations and other observations and information critical to the safety of persons on the installation or the protection of the environment; and
- Daily maintenance and operating activities, including any activity that may be critical to the safety of persons on the installation, the protection of the environment or the prevention of waste (section 77(b) and (c) of the OGDPR).

Operators must ensure that:

- All processes are in place and implemented to identify, generate, control and retain records necessary to support operational and regulatory requirements; and
- The records are readily accessible for inspection by the Regulator (section 80 of the OGDPR).

Maintenance of Records The Safety Plan should identify the types of records to be maintained to demonstrate safety and conformity to the Management System and the Safety Plan.

In identifying such records, the operator shall take into account the various record keeping requirements set out in Part 11 of the OGDPR. In particular, training and competency records, inspection, testing and maintenance records, compliance monitoring records, records of safety incidents, accidents and investigations, and records of safety activities undertaken in response to investigation reports, audit outcomes or other safety initiatives must be maintained as per record retention requirements outlined in legislation and/or the Management System.

Safety Plan Guidelines and Interpretation Notes

Documentation and Document Control

The Safety Plan is a controlled document and an up-to-date copy must be provided to the Regulator when the document is changed. Where the Safety Plan consists of multiple documents, the same expectation applies.

The Regulator may request an up-to-date copy of any document required to conduct the Board's oversight function.

Safety Plan Guidelines and Interpretation Notes

8. REGULATOR'S APPROVAL

These *Safety Plan Guidelines and Interpretation Notes* are issued under section 18 of the *Oil and Gas Operations Act* effective January 1, 2019.

They replace the *Safety Plan Guidelines* jointly issued by the National Energy Board, Canada-Newfoundland and Labrador Offshore Petroleum Board and Canada-Nova Scotia Offshore Petroleum Board on March 31, 2011, and any other previous guidelines relating to the contents of Safety Plans, within the jurisdiction of the GNWT Regulator of Oil and Gas Operations.

A handwritten signature in black ink, appearing to read 'L. Sebert', is written over a solid horizontal line.

Louis Sebert