



File OF-Surv-OpAud-E101-2014-2015 03  
31 March 2015

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Dear Mr. Jarvis:

**Enbridge Pipelines Inc. (Enbridge) and its Board-Regulated Subsidiaries – *National Energy Board Onshore Pipeline Regulations, (OPR) Final Audit Report – Public Awareness Program***

The Board has completed its Final Report for its audit of Enbridge's Public Awareness Program.

A Draft Report documenting the Board's evaluation of Enbridge's Public Awareness Program was provided to Enbridge on 4 February 2015 for review and comment. On 6 March 2015, Enbridge submitted its response.

The Board has considered Enbridge's comments and has made changes to the Final Audit Report and its Appendices as it determined to be appropriate.

The findings of the audit are based upon an assessment of whether Enbridge was compliant with the regulatory requirements contained within:

- *National Energy Board Act;*
- *National Energy Board Onshore Pipeline Regulations;*
- *National Energy Board Pipeline Crossing Regulations, Parts I and II;* and
- Enbridge's policies, programs, practices and procedures.

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Enbridge was required to demonstrate the adequacy and effectiveness of the methods selected and employed within its Programs to meet the regulatory requirements listed above.

The Board has enclosed the Final Audit Report and associated appendices with this letter. The Board will make the Final Audit Report public on the Board's website.

Within 30 days of the issuance of the Final Audit Report by the Board, Enbridge is required to file a Corrective Action Plan (CAP), which describes the methods and timing for addressing the Non-Compliant findings identified through this audit, for approval.

The Board will make the CAP public and will continue to monitor and assess all of Enbridge's corrective actions with respect to this audit until they are fully implemented. The Board will also continue to monitor the implementation and effectiveness of Enbridge's Public Awareness Program and management system through targeted compliance verification activities as a part of its on-going regulatory mandate.

If you require any further information or clarification, please contact Ken Colosimo, Lead Auditor, Operations Business Unit at 403-292-4926 or toll-free at 1-800-899-1265.

Yours truly,

*Original signed by*

Sheri Young  
Secretary of the Board

Attachment – Final OPR Audit Report documents

cc: Mr. Al Monaco, President and CEO, Enbridge Inc.

National Energy  
Board



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***National Energy Board Onshore Pipeline Regulations (OPR)***  
**Final Audit Report of the Enbridge Pipelines Inc. Public Awareness Program**

**File OF-Surv-OpAud-E101-2014-2015 03**

Enbridge Pipelines Inc. and National Energy Board-Regulated Subsidiaries (Enbridge)  
3000 Fifth Avenue Place  
425 -1st Street S.W.  
Calgary, Alberta T2P 3L8

31 March 2015



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## Executive Summary

Companies regulated by the National Energy Board (NEB or the Board) must demonstrate a proactive commitment to continual improvement in safety, security and environmental protection. Pipeline companies under the Board's regulation are required to incorporate adequate, effective and implemented management systems into their day-to-day operations. These systems and associated technical management programs include the tools, technologies and actions needed to ensure NEB regulated pipelines are safe and remain that way over time. In the public interest, the Board holds companies accountable for safety and environmental outcomes.

This report documents the Board's comprehensive audit of Enbridge's Public Awareness program as it applies to its NEB-regulated subsidiaries and pipeline facilities. The audit was conducted based on the requirements contained within the *National Energy Board Pipeline Crossings Regulations* (PCR), *Canadian Standards Association Standard Z662-11, Oil and Gas Pipeline Systems* (CSA Z662-11) as well as the *National Energy Board Onshore Pipeline Regulations* (OPR) as amended on 21 April 2013. The Board has incorporated these requirements within its audit protocol.

The Board conducted the audit following its published audit protocol, which identifies five management system elements. These five elements are broken into 17 sub-elements. Each sub-element reflects several regulatory requirements. Companies must comply with 100 per cent of the regulatory requirements of each sub-element being assessed. If a company's program is found to be deficient with respect to any regulatory requirement, the entire sub-element will be found Non-Compliant.

The Board notes that the companies it regulates must establish and implement documented management systems and apply them to the programs as described within the OPR as well as their Crossings and Public Awareness programs. The specific management system requirements are described within section 6 of the OPR and within the referenced CSA Standard Z662, *Oil and Gas Pipeline Systems* in clause 3.1 *Safety and Loss Management System*.

In reviewing the results of Enbridge's Public Awareness program audit the Board notes that Enbridge did not demonstrate it had developed and implemented a management system that directly applies to this program. The Board notes that the Public Awareness program management system requirements can be met by being directly subsumed within the programs referenced in the OPR or as part of a documented Safety and Loss Management System compliant with clause 3.1 of CSA Z662 *Oil and Gas Pipeline Systems*. The Board did not see evidence that Enbridge had implemented either approach. Further, the Board notes that the requirements to have a documented, implemented and maintained Safety and Loss Management System are not new. The Board is of the view that this management system deficiency could have been prevented if Enbridge had ensured that appropriate compliance identification and monitoring processes had been established.

The Public Awareness program is part of Enbridge's Land Services department. During the audit, Enbridge provided evidence that it was in the process of applying its corporate Integrated Management System to its Lands Services department. Enbridge demonstrated that some of the required processes had already been integrated into its program management activities; however, at the time of the audit, the Integrated Management System had not been fully documented, established or implemented for the Lands Services programs. Enbridge will need to develop and implement corrective actions to ensure establishment and implementation of a compliant management system.

It is important to understand that the Board's finding regarding Enbridge's management system primarily reflects the company's stage in developing and applying its management system. It does not necessarily reflect the lack of technical management activities being undertaken to ensure the safety of the pipeline. The Board found that, regardless of the lack of a compliant management system, Enbridge had developed and implemented a Public Awareness program that was addressing the majority and most significant of its hazards and the majority of its regulatory requirements.

The Board has made a significant number of Non-Compliant findings. The Board's analysis of these findings indicates that most of the non-compliances relate to the establishment and implementation of the management system processes and consequently its Safety and Loss Management System. All of the Board's findings are documented in Appendix I of this audit report.

The majority of the Non-Compliant findings fall into two categories:

- lack of integration of its Public Awareness program into the overall operational oversight management system processes: and
- failure to implement management system sub-elements that are consistent with the Board's expectations.

The Board has determined that no enforcement actions are immediately required to address the Non-Compliant findings identified in this audit. Within 30 days of the Final Audit Report being issued, Enbridge must develop and submit a Corrective Action Plan for Board approval. The Corrective Action Plan must detail how Enbridge intends to resolve non-compliances identified by this audit. The Board will assess the implementation of the corrective actions to confirm they are completed in a timely manner applied consistently across Enbridge's regulated system. The Board will also continue to monitor the overall implementation and effectiveness of Enbridge's Management Systems through targeted compliance verification activities as a part of its ongoing regulatory mandate.

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## 1.0 Audit Terminology and Definitions

*(The Board has applied the following definitions and explanations in measuring the various requirements included in this audit. They follow or incorporate legislated definitions or guidance and practices established by the Board, where available.)*

**Adequate:** The management system, programs or processes complies with the scope, documentation requirements and, where applicable, the stated goals and outcomes of the NEB Act, its associated regulations and referenced standards. Within the Board's regulatory requirements, this is demonstrated through documentation.

**Audit:** A systematic, documented verification process of objectively obtaining and evaluating evidence to determine whether specified activities, events, conditions management systems or information about these matters conform to audit criteria and legal requirements, and communicating the results of the process to the company.

**Compliant:** A program element meets legal requirements. The company has demonstrated that it has developed and implemented programs, processes and procedures that meet legal requirements.

**Corrective Action Plan:** Addresses the non-compliances identified in the audit report, and explains the methods and actions that will be used to correct them.

**Developed:** A process or other requirement has been created in the format required and meets the described regulatory requirements.

**Effective:** A process or other requirement meets its stated goals, objectives, targets and regulated outcomes. Continual improvement is being demonstrated. Within the Board's regulatory requirements, this is primarily demonstrated by records of inspection, measurement, monitoring, investigation, quality assurance, audit and management review processes as outlined in the OPR

**Established:** A process or other requirement has been developed in the format required. It has been approved and endorsed for use by the appropriate management authority and communicated throughout the organization. All staff and persons working on behalf of the company or others that may require knowledge of the requirement are aware of the process requirements and its application. Staff has been trained on how to use the process or other requirement. The company has demonstrated that the process or other requirement has been implemented on a permanent basis. As a measure of "permanent basis", the Board requires the requirement to be implemented, meeting all of the prescribed requirements, for three months.

**Finding:** The evaluation or determination of the compliance of programs or elements in meeting the requirements of the *National Energy Board Act* and its associated regulations.



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**Implemented:** A process or other requirement has been approved and endorsed for use by the appropriate management authority. It has been communicated throughout the organization. All staff and persons working on behalf of the company or others that may require knowledge of the requirement are aware of the process requirements and its application. Staff have been trained on how to use the process or other requirement. Staff and others working on behalf of the company have demonstrated use of the process or other requirement. Records and interviews have provided evidence of full implementation of the requirement, as prescribed (i. e. the process or procedures are not partially utilized).

**Inventory:** A documented compilation of required items. It must be kept in a manner that allows it to be integrated into the management system and management system processes without further definition or analysis.

**List:** A documented compilation of required items. It must be kept in a manner that allows it to be integrated into the management system and management system processes without further definition or analysis.

**Maintained:** A process or other requirement has been kept current in the format required and continues to meet regulatory requirements. With documents, the company must demonstrate that it meets the document management requirements in OPR, section 6.5 (1) (o). With records, the company must demonstrate that it meets the records management requirements in OPR, section 6.5 (1) (p).

**Management System:** The system set out in OPR sections 6.1 to 6.6. It is a systematic approach designed to effectively manage and reduce risk, and promote continual improvement. The system includes the organizational structures, resources, accountabilities, policies, processes and procedures required for the organization to meet its obligations related to safety, security and environmental protection.

*(The Board has applied the following interpretation of the OPR for evaluating compliance of management systems applicable to its regulated facilities.)*

*As noted above, the NEB management system requirements are set out in OPR sections 6.1 to 6.6. Therefore, in evaluating a company's management system, the Board considers more than the specific requirements of Section 6.1. It considers how well the company has developed, incorporated and implemented the policies and goals on which it must base its management system as described in section 6.3; its organizational structure as described in section 6.4; and considers the establishment, implementation, development and/or maintenance of the processes, inventory and list described in section 6.5(1). As stated in sections 6.1 (c) and (d), the company's management system and processes must apply and be applied to the programs described in section 55.*

**Non-Compliant:** A program element does not meet legal requirements. The company has not demonstrated that it has developed and implemented programs, processes and procedures that meet the legal requirements. A corrective action plan must be developed and implemented.



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**Practice:** A repeated or customary action that is well understood by the persons authorized to carry it out.

**Procedure:** A documented series of steps followed in a regular and defined order, thereby allowing individual activities to be completed in an effective and safe manner. A procedure also outlines the roles, responsibilities and authorities required for completing each step.

**Process:** A documented series of actions that take place in an established order and are directed toward a specific result. A process also outlines the roles, responsibilities and authorities involved in the actions. A process may contain a set of procedures, if required.

*(The Board has applied the following interpretation of the OPR for evaluating compliance of management system processes applicable to its regulated facilities.)*

*OPR section 6.5(1) establishes the basic requirements for management system processes. In evaluating a company's management system processes, the Board considers whether each process or requirement: has been established, implemented, developed or maintained as described within each section; whether the process is documented; and whether the process is designed to address the requirements of the process, for example a process for identifying and analyzing all hazards and potential hazards. Processes must contain explicit required actions including roles, responsibilities and authorities for staff establishing, managing and implementing the processes. The Board considers this to constitute a common 5 w's and h approach (who, what, where, when, why and how). The Board recognizes that the OPR processes have multiple requirements; companies may therefore establish and implement multiple processes, as long as they are designed to meet the legal requirements and integrate any processes linkages contemplated by the OPR section. Processes may incorporate or contain linkage to procedures, where required to meet the process requirements.*

*As the processes constitute part of the management system, the required processes must be developed in a manner that allows them to function as part of the system. The system requirements are described in OPR section 6.1. The processes must be designed in a manner that contributes to the company following its policies and goals established and required by section 6.3.*

*Further, OPR section 6.5 (1) indicates that each process must be part of the management system and the programs referred to in OPR section 55. Therefore, to be compliant, the process must also be designed in a manner which considers the specific technical requirements associated with each program and is applied to and meets the process requirements within each program. The Board recognizes that single process may not meet all of the programs; in these cases it is acceptable to establish governance processes as long as they meet the process requirements (as described above) and direct the program processes to be established and implemented in a consistent manner that allows for the management system to function as described in 6.1.*

**Program:** A documented set of processes and procedures designed to regularly accomplish a result. A program outlines how plans, processes and procedures are linked; in other words, how each one contributes to the result. A company regularly plans and evaluates its program to check that the program is achieving the intended results.

*(The Board has applied the following interpretation of the OPR for evaluating compliance of programs required by the NEB regulations.)*

*The program must include details on the activities to be completed including what, by whom, when, and how. The program must also include the resources required to complete the activities.*

## 2.0 Abbreviations

CAP: Corrective Action Plan

CLC: *Canada Labour Code Part II*

COHSR: Canada Occupational Health and Safety Regulations

CSA Z662-11: CSA Standard Z662 entitled *Oil and Gas Pipeline Systems*, 2011 version

Enbridge: Enbridge Pipelines Inc. and its NEB-regulated subsidiaries

GOT: Goals, Objectives and Targets

MOC: Management of Change

NEB: National Energy Board

OMM: Operations Maintenance Manuals

OPR: *National Energy Board Onshore Pipeline Regulations*

PA: Public Awareness

PLM: Pipeline Maintenance

ROW: Right-of-Way

TALL: Transmission Advanced Line Locating

### 3.0 Introduction: NEB Purpose and Framework

The NEB's purpose is to promote safety and security, environmental protection, and efficient energy infrastructure and markets in the Canadian public interest within the mandate set by Parliament in the regulation of pipelines, energy development and trade. In order to ensure that pipelines are designed, constructed, operated and abandoned in a manner that ensures: the safety and security of the public and the company's employees; safety of the pipeline and property; and protection of the environment. To do this, the Board has developed regulations requiring companies to establish and implement documented management systems applicable to specified technical management and protection programs. These management systems and programs must take into consideration all applicable requirements of the NEB Act and its associated regulations, as well as the *Canada Labour Code Part II (CLC)*.

To achieve compliance, regulated companies must demonstrate established, implemented, adequate and effective methods for identifying and managing hazards and risks. The Board reviews the documented compliance and incident history of the company. This review determines the appropriate scope for the audit. During the audit, the Board reviews documentation and some company records, and interviews of both corporate and regionally-based staff.

The Board also conducts separate but linked technical inspections of a representative sample of the company's facilities to evaluate the adequacy, effectiveness and implementation of the management system and programs. The Board bases the scope and location of the inspections on the needs of the audit. The inspections follow the Board's standard inspection processes and practices. Although they inform the audit, inspections are considered independent of the audit. If unsafe or non-compliant activities are identified during an inspection, they are actioned in accordance with the Board's standard inspection and enforcement processes to ensure ongoing safe operation

After completing its field activities, the Board develops and issues a Final Audit Report. The Final Audit Report outlines the Board's audit activities, provides an evaluation of the company's management system and programs identifies deficiencies and communicates compliance findings. The audit report follows the format of the Board's published Audit Protocol Once the Board issues the Final Audit Report, the company must submit and implement a Corrective Action Plan to address all Non-Compliant findings for Board approval. Final Audit Reports are published on the Board's website. The audit results are integrated into NEB's risk-informed lifecycle approach to compliance assurance.

### 4.0 Background

Enbridge operates approximately 10,733 km of pipeline in six Canadian provinces and territories. These pipeline facilities include pump stations, tankage and associated operational

assets. All of these facilities are within the definition of a “pipeline” as included in the NEB Act. Enbridge also has a considerable amount of non-federally regulated infrastructure in Alberta and across the United States, which complete its North American system. Enbridge’s system allows it to transport liquids from northern and western Canada to end-users in the Eastern regions of Canada and the United States. In order for Enbridge to operate its pipelines effectively, it has developed a management structure that reflects its safety and security management, and environmental obligations, as well as its corporate, national, regional and international needs. Enbridge Pipelines Inc. controls and uses several entities that hold NEB-issued certificates for operating in Canada. The entities included within the scope of this audit are identified in Section 5.0, Audit Objectives and Scope of this report.

During audit planning, company staff indicated that Enbridge and its subsidiaries operate the pipelines and facilities using a common management system and technical programs. In order to effectively evaluate compliance of such an expansive system within a reasonable timeframe, the Board chose to conduct individual, comprehensive audits of Enbridge’s required technical programs and management system. This report documents one of six management system and program audits. The audits are titled:

- *Enbridge Integrity Management Program Audit;*
- *Enbridge Safety Management Program Audit;*
- *Enbridge Environmental Protection Program Audit;*
- *Enbridge Emergency Management Program Audit;*
- *Enbridge Third-Party Crossings Program Audit; and*
- *Enbridge Public Awareness Program Audit.*

Audit results confirmed that Enbridge operates its facilities using an organizational structure to implement a common governance management system that applies to all of its business and operational activities. Some findings are therefore similar in each audit.

## **5.0 Audit Objectives and Scope**

The objective of the audit was to determine the adequacy and effectiveness of Enbridge’s Public Awareness program. The requirements against which Enbridge’s was audited are contained within:

- *The National Energy Board Act;*
- *The National Energy Board Onshore Pipeline Regulations;*
- *The Canada Labour Code, Part II (CLC);*
- *The Pipeline Crossing Regulations Part I and Part II;*
- *The Safety and Health Committees and Representatives Regulations;*
- *Canadian Standards Association (CSA) Z662 – 11 – Oil and Gas Pipeline Systems; and*
- *Enbridge’s policies, programs, practices and procedures.*

This audit was conducted using the National Energy Board Onshore Pipeline Regulations (OPR) as amended on 21 April 2013. This amendment clarified the Board’s expectations for



establishing and implementing a documented management system applicable to specified programs. Public Awareness programs are not directly referenced within the OPR; however, the hazards addressed by Public Awareness programs are considered to be subsumed within the integrity, emergency, environmental and safety management programs. Before issuing the amendment, the Board consulted and communicated its regulated companies with respect to the new requirements; therefore, an implementation grace period was not given when the OPR was promulgated. As a result, when evaluating compliance, this audit did not consider any extra time Enbridge may have needed to implement changes.

As noted, Enbridge Pipelines Inc. companies hold a number of certificates to operate in Canada. The Board has included the following companies within the scope of this audit:

- Enbridge Pipelines Inc.;
- Enbridge Bakken Pipeline Company Inc. on behalf of Enbridge Bakken Pipeline Limited Partnership;
- Enbridge Southern Lights GP Inc. on behalf of Enbridge Southern Lights LP;
- Enbridge Pipelines (NW) Inc.; and
- Enbridge Pipelines (Westspur) Inc.

For more Enbridge facility information, refer to Appendix II of this report.

## 6.0 Audit Process and Methodology

Once Enbridge was identified through the annual compliance verification plan process as being due for a full system audit, the Board initiated its audit process. In undertaking this audit, the Board has applied its standard audit practice following its published protocols. The Board's standard practice and audit activities include:

- Formal notification of the Board's intent to audit by letter;
- Interactive planning processes with the company;
- Information gathering;
- Documentation and record review;
- Program presentations by company personnel and interviews with company personnel;
- Associated inspections and facility reviews;
- Close-out discussions and meetings;
- Developing and Issuing Draft Audit Report to Enbridge;
- Developing, finalizing and issuing the Final Audit Report;
- Reviewing and approving any required Corrective Action Plans;
- Reviewing implementation of Corrective Action Plans; and
- Issuing closure letters.

These audit activities allow the company to demonstrate whether its management system and programs comply. Audits also allow the Board to evaluate the company with respect to: assuring compliance to regulatory requirements; and assuring appropriate safety, security and environmental outcomes as described in the Board's expectations.

As noted, Enbridge Pipelines Inc. operates an expansive liquids pipeline system using a common management system and Public Awareness program. Furthermore, Enbridge divides its Canadian assets into five operational regions: Northern Region, Western Region, Central Region, Southern Prairie Region and Eastern Region. The Board therefore developed its audit plan to evaluate Enbridge's Public Awareness program and to assure that it was appropriately managed and applied to all of its regulated facilities regardless of location. To this end, the Board conducted interviews, inspections and documentation and record reviews in each region as well as the Edmonton office. The Board requires that any audit Non-Compliant findings made and corrective actions implemented as a result must be applied across all of Enbridge's Board regulated systems and subsidiaries.

## 7.0 Audit Activities

The Board informed Enbridge Pipelines Inc. of its intent to audit its NEB regulated facilities in a letter dated 19 December 2013. Following this letter, Board audit staff met with Enbridge staff on a regular basis to arrange and coordinate this audit. The Board also provided Enbridge with an information guidance document to help Enbridge prepare for the audit, and provide access to documentation and records to demonstrate its compliance. Enbridge established a digital access portal for Board staff to review documentation and records.

On 5 May 2014, an opening meeting was conducted with representatives from Enbridge in Edmonton, Alberta to confirm the Board's audit objectives, scope and process. The opening meeting was followed by Edmonton office interviews from 5 to 16 May 2014, and various field level audit activities as described in the table below. Throughout the audit, Board audit staff gave Enbridge daily summaries with action items.

On 21 and 22 October 2014, the Board held an audit pre-close-out meeting with Enbridge. At this meeting Board staff and Enbridge staff discussed potential deficiencies identified during field activities and discussed additional information that could be of value to the Board prior to compiling its draft audit report. An audit close-out meeting was held on 17 December 2014 to provide Enbridge with a description of the recommendations that staff would be bringing to the Board for decision.

<b>Public Awareness Program Audit Office and Field Activities</b>
<ul style="list-style-type: none"> <li>• Audit Opening Meeting (Edmonton, AB) – 5 May 2014</li> <li>• Edmonton Office Interviews (Edmonton, AB) – 5-16 May 2014</li> <li>• Field verification activities for the Audit:               <ul style="list-style-type: none"> <li>• Interviews – Sherwood Park, AB – 26-30 May 2014</li> <li>• Interviews – Regina, SK and Estevan, SK – 9 -13 June 2014</li> <li>• Interviews – Sarnia, ON - 23-27 June 2014</li> <li>• Inspection – Toronto, ON area - 8-10 July, 2014</li> <li>• Inspection – Montreal, QC area - 10-11 July 2014</li> <li>• Inspection – Regina – Estevan, SK – Cromer, MB - 18-21 August 2014</li> <li>• Aerial patrol – Sarnia, ON to Montreal, QC - 4 September 2014</li> </ul> </li> </ul>

- Edmonton Office Interviews (Edmonton, AB) – 14-17 October 2014
- Audit Pre-Close-Out Meeting of Information Gaps (Edmonton, AB) – 21-22 October 2014
- Audit Close-Out Meeting (Edmonton, AB) - 17 December 2014

## 8.0 Management System Evaluation

The Public Awareness program activities are required to be formally managed within a documented and implemented management system. The Board notes that this program requires the development and implementation of a documented management system either directly subsumed within the management system and the applicable programs described in the OPR or as part of a documented Safety and Loss Management System required by clause 3.1 of CSAZ662 *Oil and Gas Pipeline Systems*.

The Board's management system requirements are found in section 6 of the OPR and within the referenced CSA Z662 *Oil and Gas Pipeline Systems* clause 3.1 *Safety and Loss Management System Management System*. The Board notes that Public Awareness program are not specifically referenced within section 55 of the OPR and therefore are not subject to the same organizational requirements as other referenced programs.

The Board found that, while Enbridge has demonstrated that it is in the process of applying its Integrated Management System to its Lands Services functions and has accounted for many of the processes described within the Board's protocol and the legal requirements, it did not demonstrate that it has developed and implemented a documented management system that meets the Board's requirements. Enbridge did not provide evidence of an organized structure that was specifically designed, implemented and managed to meet the regulatory requirements. Further, the Board notes that some of the key management system activities were not designed appropriately or being undertaken as required. As an example, Enbridge's auditing practices were not designed in a manner that would require a full management system or compliance audit to be undertaken.

The Board found Enbridge to be Non-Compliant with its requirements to develop, implement and maintain a documented management system. Enbridge will need to develop and implement corrective actions to ensure establishment and implementation of a management system.

The Board notes that it is important to understand that the Board's management system Non-Compliant finding reflects Enbridge's development and implementation of its management system. It does not necessarily reflect the lack of technical management activities being undertaken to ensure the safety of the public, workers or the environment.

## 9.0 Program Summary

NEB-regulated companies must demonstrate a proactive commitment to continual improvement in safety, security, and environmental protection. Pipeline companies under the Board's regulation are required to incorporate safety management programs into their day-to-day

operations. These programs must include the tools, technologies and actions needed to ensure that workers are safe.

The Board found that Enbridge has established and implemented a Public Awareness program that provides external stakeholders with information regarding living and working around its facilities. As well, this program develops and distributes information related to emergency response to first responders and other stakeholders. Enbridge's Public Awareness program also:

- undertakes activities to reach its identified stakeholders; and
- is positioned where it can best be leveraged within the Lands and Emergency Departments.

At the time of the audit, Enbridge was in the process of developing and implementing the integrated management system (IMS-19) which, if implemented, may address many of the deficiencies noted in this audit.

## 10.0 Summary of Audit Findings

The Board's audit was conducted following its Audit Protocol, which identifies five Management System elements. These five elements are further broken down into 17 sub-elements. Each sub-element reflects a number of regulatory requirements. The NEB requires companies to be compliant with one hundred percent of the regulatory requirements of each of the Management System sub-elements being assessed. If a company's program is found to be deficient with respect to any regulatory requirement, the entire sub-element will be found in Non-Compliance. A Corrective Action Plan will be required in order to demonstrate to the Board that appropriate actions will be taken to achieve full compliance.

The following summary represents a high-level overview of the Board's audit findings for Enbridge's Public Awareness program based on information provided Enbridge during the audit.

**Details of how each of the audited sub-elements impacts the Public Awareness program and a full description of the Board's assessment for each of its Management System sub-elements can be found in Appendix I of this report.**

### **Element 1.0 - Policy and Commitment**

#### **Sub-element 1.1 - Leadership and Accountability**

This sub-element of the audit requirements states that the company must appoint an Accountable Officer and notify the Board of the appointment.

Enbridge has submitted a written notice to the NEB indicating that it has appointed an Accountable Officer. In its submission, Enbridge confirmed that its Accountable Officer has authority over the human and financial resources required to meet the Board's substantive expectations.

Enbridge has submitted a written notice to the NEB indicating that it has appointed an Accountable Officer. In its submission, Enbridge confirmed that its Accountable Officer has authority over the human and financial resources required to meet the Board's substantive expectations.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

#### Sub-element 1.2 - Policy and Commitment Statements

This sub-element of the audit requirements states that the company must have documented policies and goals to ensure the safety and security of the public, workers, and the pipeline and ensure protection of property and the environment. Further, as these policies and goals are to be used to establish and implement the management and programs, the Board requires that the policies and goals be explicit from the perspective of design, content and communication.

The Board found that Enbridge had corporate and program level policies and goals that related to its Public Awareness program.

The Board also found that, notwithstanding the general policies developed, Enbridge did not demonstrate that it had a policy that explicitly describes internal reporting of hazards, potential hazards, incidents and near misses and describes the conditions under which a person making a report will be granted immunity from disciplinary action that meets the Board's requirements.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

### **Element 2.0 – Planning**

#### Sub-element 2.1 - Hazard Identification, Risk Assessment and Control

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for identifying and analyzing all hazards and potential hazards, assessing the degree of risk associated with the hazards, and implementing control measures to minimize or eliminate risk.

The Board found that Enbridge demonstrated that it has established and implemented a Public Awareness program that incorporates the identification of hazards and introduces controls. While Enbridge demonstrated that it is in the process of establishing a risk register to serve as its hazard inventory, it was not able to demonstrate that has implemented a process to evaluate the risks that is consistent with Board expectations.

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Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

### Sub-element 2.2 - Legal Requirements

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for identifying and monitoring compliance with all legal requirements applicable to the company. Also, the company must maintain a list of the legal requirements that apply to it.

The Board found that Enbridge demonstrated that it was tracking, listing and communicating the majority of its legal requirements.

The Board also found that Enbridge's methods to monitor its legal requirements and compliance to them did not meet the Board's requirements.

The Board found that Enbridge's legal list was not maintained as a single list, was incomplete and was not kept at the level of specificity required to enable the company to ensure and monitor its compliance with the legal requirements.

The Board found that Enbridge had developed and implemented practices to communicate its legal requirements. The Board found one deficiency with Enbridge's communications practices with respect to its compliance practices. Enbridge did not demonstrate that it had an effective method for communicating new or revised legal requirements between the head office and regional field staff and consequently third-parties.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

### Sub-element 2.3 - Goals, Objectives and Targets

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for developing and setting goals, objectives and specific targets for the risks and hazards associated with the company's facilities and activities.

The Board found that Enbridge had established processes for the development and implementation of Goals, Objectives and Targets that align with the Board's requirements.

The Board also found that Enbridge had not established explicit goals relating to prevention of ruptures, liquid and gas releases, fatalities and injuries the protection of the environment as required by the OPR. Further, while Enbridge demonstrated that it had developed management practices that correspond to the Board's requirements and had implemented initiatives to address the issues, Enbridge did not demonstrate that it had established specific objectives, targets or

performance measures that ensure that its various public awareness initiatives are successfully meeting the management outcomes required.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

#### Sub-element 2.4 - Organizational Structure, Roles and Responsibilities

This sub-element of the audit requirements states that the company must have a documented organizational structure that enables it to meet the requirements of its management system. The company must also complete an annual documented evaluation to demonstrate that there is adequate human resourcing to meet these obligations.

The Board found that Enbridge had a documented organizational structure and communicates the roles responsibilities and authorities of the officers and employees at all levels of the company.

The Board found that Enbridge had established and implemented several mechanisms for reviewing its Public Awareness program workforce needs. The Board did not observe any issues of insufficient resources during this audit.

The Board also found that Enbridge's evaluation of need did not specifically account for all staff with Public Awareness program responsibilities and, therefore, did not demonstrate that the human resources allocated to establishing, implementing and maintaining its management system and for meeting its requirements are sufficient.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

### **Element 3.0 - Implementation**

#### Sub-element 3.1 - Operational Control-Normal Operations

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for developing and implementing corrective, mitigative, preventive and protective controls for the hazards and risks identified in Elements 2.0 and 3.0.

The Board found that, while its review of the hazard identification sub-element found deficiencies, as identified in sub-element 2.2 of this report, Enbridge had implemented appropriate controls to address its identified hazards.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

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### Sub-element 3.2 - Operational Control-Upset or Abnormal Operating Conditions

This sub-element of the audit requirements states that the company must establish and maintain plans to identify the potential for upset or abnormal operating conditions, accidental releases, incidents and emergency situations.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

### Sub-element 3.3 - Management of Change (MOC)

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for identifying and managing any change that could affect safety, security or protection of the environment.

While Enbridge has implemented some aspects of an MOC, it did not demonstrate that it has an established and implemented process for identifying and managing change that could affect safety, security or protection of the environment, including new hazards or risks, changes in design, specifications, standards or procedures, and change in the company's organizational structure or the legal requirements.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

### Sub-element 3.4 - Training, Competence and Evaluation

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for developing competency requirements and training programs for its employees and contractors. These competency requirements and training programs must enable employees and contractors to perform their duties in a manner that is safe, ensures the security of the pipeline, and protects the environment.

The Board has found that Enbridge has established and implemented formal management system for identifying and managing its training requirements.

The Board also found that Enbridge has not established and implemented processes for identifying and verifying the competency requirements of its workers as required in the OPR and CSA Z662-11. The Board identified that Enbridge has started to implement a new process for the identification and verification of worker competency; however, this new process remains Non-Compliant as it has not been established or implemented.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

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### Sub-element 3.5 - Communication

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for internally and externally communicating safety, security and environmental protection information.

Enbridge was able to demonstrate that it has established an external communication plan that identified the appropriate stakeholders and developed messages relating to maintaining the safety and security of the pipeline and protection of the environment through its website, crossing procedures and crossing agreements as well as its Public Awareness program.

The Board found that while Enbridge had been communicating internally, its practices were deficient. The Board found that Enbridge had not developed an internal communication plan that met the Board's requirements.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

### Sub-element 3.6 - Documentation and Document Control

This sub-element of the audit requirements states that the company must have an established, implemented and effective process for identifying and managing the documents required to meet the company's obligations for conducting activities in a manner that ensures the safety and security of the public, company employees and the pipeline, and that protects property and the environment.

The Board found that Enbridge had established and implemented a process for controlling its program documentation.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

## **Element 4.0 – Checking and Corrective Action**

### Sub-element 4.1- Inspection, Measurement and Monitoring

This sub-element of the audit requirements states that the company must establish and implement an effective process for inspecting and monitoring its activities and facilities. This process allows the company to evaluate the adequacy and effectiveness of the protection programs and take corrective and preventive actions if deficiencies are identified.

The Board found that Enbridge was monitoring and assessing the implementation of its Public Awareness program.

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The Board also found that Enbridge had not established process to monitor, manage and track the results of its assessments to conclusion.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

#### Sub-element 4.2 - Investigating and Reporting Incidents and Near-misses

This sub-element of the audit requirements states that the company must establish and implement an effective process for reporting hazards, potential hazards, incidents and near-misses, and for taking corrective and preventive actions to address them. This includes investigating if the hazards, potential hazards, incidents and near-misses have or could have resulted in the safety and security of the public, employees and the pipeline, and protection of property and the environment. This sub-element also requires a company to have an established, maintained and effective data management system for monitoring and analyzing the trends in hazards, incidents and near-misses.

The Public Awareness program staff, land agents in particular are involved in the follow-up to the reported unauthorized activities reported in their regions. Interviews confirmed that analyses of trends of unauthorized activities are discussed with the Damage Prevention group in Land Services in the Head Office.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

#### Sub-element 4.3 - Internal Audit

This sub-element of the audit requirements states that a company must establish and implement an effective quality assurance program for its management system and for each protection program, including a process for conducting regular inspections and audits and for taking corrective and preventive actions if deficiencies are identified.

Enbridge demonstrated that its Public Awareness program is the subject of various reviews and assessments. The Board found, however, that Enbridge was not tracking or managing the recommendations arising from the reviews and assessments through to resolution. The Board therefore found that Enbridge's review processes were not effective and Non-Compliant with CSA Z662-11.

The Board found that Enbridge's Public Awareness program had been audited in 2014.

The Board also found that Enbridge's process for conducting audits did not meet the Board's requirements.

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Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

#### Sub-element 4.4 - Records Management

This sub-element states that a company must establish and implement an effective process for generating, retaining, and maintaining records that document the implementation of the management system and its protection programs.

Enbridge was able to demonstrate that the records generated from the implementation of its Public Awareness program are managed to meet expectations and accessible to those who require access to them in the performance of their duties.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

### **Element 5.0 – Management Review**

#### Sub-element 5.1 - Management Review

This sub-element states that a company must establish and implement an effective process for conducting an annual management review of the management system and each protection program and for ensuring continual improvement in meeting the company's obligations. This sub-element also requires a company to complete an annual report for the previous calendar year, signed by the accountable officer, describing the performance of the company's management system in meeting its obligations.

The Board found that Enbridge had established and implemented processes to address the stated requirements and had undertaken the activities associated with its processes. The Board also found, however, that Enbridge's processes did not fully meet all of the requirements. As a result, the management reviews completed by Enbridge were also found to be deficient.

Additionally, the Board found that some of the Non-Compliant findings made in this audit fall within the responsibility and accountability of Enbridge's senior management. These relate to direction, management and oversight and, as such, have contributed to the Non-compliant finding for this element.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

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## 11.0 Conclusions

Companies regulated by the NEB must demonstrate a proactive commitment to continual improvement in safety, security and environmental protection. Pipeline companies under the Board's regulation must establish and implement effective management systems in their day-to-day operations. This includes the tools, technologies and actions needed to ensure workers are safe.

The Board has made a significant number of Non-Compliant findings. The Board's analysis of these findings indicates that most of the non-compliances relate to the establishment and implementation of the management system processes and consequently its Safety and Loss Management System. All of the Board's findings are documented in Appendix 1 of this audit report.

The majority of the Non-Compliant findings fall into two categories:

- lack of integration of its Public Awareness program into the overall operational oversight management system processes; and
- failure to implement management system sub-elements that are consistent with the Board's expectations.

In reviewing the results of Enbridge's Public Awareness program audit the Board notes that Enbridge did not demonstrate it had developed and implemented a management system that directly applies to this program. Further, the Board notes that the requirements to have a documented, implemented and maintained management system are not new as the Safety and Loss Management System requirements have been included in CSA Z662 for a number of years and pre-date the OPR requirements.

The Board found that, regardless of the lack of a compliant management system, Enbridge had developed and implemented a Public Awareness program that was addressing the majority and most significant of its hazards and the majority of its regulatory requirements. The Board found that Enbridge has established and implemented a Public Awareness program that provides external stakeholders with information regarding living and working around its facilities. As well, this program develops and distributes information related to emergency response to first responders and other stakeholders.

The Board has determined that no enforcement actions are immediately required to address these non-compliant findings. Upon receipt of the final report, Enbridge must develop a corrective action plan describing its proposed methods to resolve the non-compliances identified and the timeline in which corrective actions will be completed. Enbridge is required to submit its corrective action plan for Board approval within 30 days of the final Audit Report being issued. The Board will make its final Audit Report and Enbridge's approved corrective action plan public on the Board's website.

The Board will assess the implementation of all of Enbridge's corrective actions to confirm they are completed in a timely manner and on a system wide basis until they are fully implemented. The Board will also continue to monitor the overall implementation and effectiveness of Enbridge's Public Awareness program and management system as a whole through targeted compliance verification activities as a part of its ongoing regulatory mandate.

## APPENDIX I:

### PUBLIC AWARENESS PROGRAM AUDIT EVALUATION TABLE<sup>1</sup>

#### 1.0 POLICY AND COMMITMENT

##### 1.1 Leadership Accountability

**Expectations:** The company shall have an accountable officer appointed who has the appropriate authority over the company's human and financial resources required to establish, implement and maintain its management system and protection programs, and to ensure that the company meets its obligations for safety, security and protection of the environment. The company shall have notified the Audit Team of the identity of the accountable officer within 30 days of the appointment and ensure that the accountable officer submits a signed statement to the Audit Team accepting the responsibilities of their position.

**References:** PCR Part II section 4; OPR sections 6.1, 6.2, 40, 47, 48

##### **Assessment:**

##### Accountable Officer

The Board requires the company to appoint an accountable officer. The accountable officer must be given appropriate authority over the company's human and financial resources for ensuring that the company meets its obligations for safety, security and protection of the environment.

On 31 March 2014, Enbridge submitted written notice to the Board indicating that its President, Guy Jarvis, had been appointed as the accountable officer for Enbridge Pipelines Inc. and all of its subsidiaries regulated by the Board. In its submission, Enbridge confirmed that its accountable officer has the authority over the human and financial resources required to meet the Board's substantive expectations.

##### Summary

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

**Compliance Status: Compliant**

## 1.2 Policy and Commitment Statements

**Expectations:** The company shall have documented policies and goals intended to ensure activities are conducted in a manner that ensures the safety and security of the public, workers, the pipeline, and protection of property and the environment. The company shall base its management system and protection programs on those policies and goals. The company shall include goals for the prevention of ruptures, liquids and gas releases, fatalities and injuries and for the response to incidents and emergency situations.

The company shall have a policy for the internal reporting of hazards, potential hazards, incidents and near-misses that includes the conditions under which a person who makes a report will be granted immunity from disciplinary action.

The company's accountable officer shall prepare a policy statement that sets out the company's commitment to these policies and goals and shall communicate that statement to the company's employees.

### References:

PCR Part II section 4; OPR sections 6.1, 6.3, 40, 47, 48

### Assessment:

The Board expects companies to have documented policies and goals intended to ensure activities are conducted in a manner that ensures the safety and security of the public, workers, the pipeline, and protection of property and the environment.

### Policies

During the audit Enbridge provided copies of its policies that guide its Public Awareness program. During interviews, Enbridge staff indicated that the company's Public Awareness program aligns with the policies applied in the Liquid Pipelines division and Enbridge's *Operations Maintenance Manual* (OMM) – Book 1 03-02-02. As stated in this manual, the purpose of the Public Awareness program is: *“To continually educate the public residing adjacent to the right-of-way (ROW) as well as police and fire departments and other organizations about the:*

- Location of the pipeline
  - Potential emergencies involving the pipeline safety procedures in the event of an emergency
- The Public Awareness program (PAP) is also intended to continually inform the public, utilities, organizations/agencies and contractors about the
  - location of the pipeline products transported
  - safe work practices when working/ excavating near the pipeline”

This OMM policy is signed by the Manager of Land Services once the company has verified that the policy supports the goals and objectives in the

### *Department Plan.*

At the time of the audit, Enbridge was implementing a corporate management system for all of its business activities and programs. This system is known at Enbridge as the Integrated Management System (IMS). Enbridge has documented its governance processes and practices for developing and coordinating its business management system in its IMS-01 and IMS-02 documents. Section 3 of IMS 01 contains the policies that direct and focus activities to “*ensure alignment with Enbridge values and business objectives.*” Enbridge was also establishing and implementing IMS-19 for its Land Services department that conforms to the IMS requirements. The Public Awareness/Crossing/Damage Prevention programs are part of the Land Services department in the Liquid Pipelines division. Enbridge staff confirmed that as they are implemented, the Public Awareness/Crossings/Damage Prevention programs will align with the IMS policy requirements.

With the exception of the issues identified below, the Board has not identified issues with the documentation provided.

### Internal Reporting and Non-Retaliation Policies

The Board also requires companies to have a policy for the internal reporting of hazards, potential hazards, incidents and near-misses that includes the conditions under which a person who makes a report will be granted immunity from disciplinary action.

Enbridge provided several internal policies associated with its expectations related to employee conduct. For the Liquid Pipelines Division, Enbridge has posted its Compliance Policy on e-link, its intranet site. This policy includes a description of employee accountabilities to “*comply with all applicable laws, regulations and other legal requirements*”. In this policy, employees are expected to “*immediately report any new or suspected material compliance issue to their leader*”, the policy continues to say that “*in reporting any new or suspected compliance issues all employees will be treated in accordance with Enbridge’s non-retaliation principles set out in Enbridge’s Statement on Business Conduct.*”

Enbridge’s IMS-01 Governing Policies and Processes Management System document was released 01-01-2014. According to Enbridge, it is the foundation document for the management systems that were, at the time of the audit, in various stages of development and implementation. This document includes the statement that *management will provide an open and confidential method for the Workforce to report Non-Compliant unethical or unlawful behaviour, without fear of retaliation.*

Another document that was presented for the audit was the Statement of Business conduct which applies to the Enbridge Group of companies including all employees and contract staff. The Statement includes a section describing Enbridge’s non-retaliation policy. It includes the assertion that “*no retaliatory action will be taken against an employee or contractor for providing good faith information either internally or to a government authority, or for participating in any proceeding concerning alleged violations of any laws or policies. Disciplinary measures may be taken against an employee or contractor if they participated in the activity, even if they reported it.*”

During its review of Enbridge's documentation the Board found that, while Enbridge has several policies and statements that encourage reporting of certain issues to without fear of reprisal, the existing policies did not explicitly include the reporting of hazards and potential hazards and the conditions under which a person who makes a report will be granted immunity. The Board's expectations are explicit with respect to the reporting and the immunity provisions being within the same policy. Additionally the Board found that Enbridge limited its reporting requirements to compliance. The Board notes that, as hazards and potential hazards are not necessarily violations of law or the result of unethical behavior, none of these policies or statements provides the required clarity and therefore do not meet the Board's requirements.

### Summary

The Board found that Enbridge has developed many policies, processes, principles, programs and to guide and support its Public Awareness program.

The Board also found the following areas of non-compliance in the Policy and Commitment Statements sub-element:

- Enbridge did not demonstrate that it has a policy that explicitly describes internal reporting of hazards, potential hazards, incidents and near-misses as required and include the conditions under which a person who reports a hazard, potential hazard, incident or near-miss will be granted immunity from disciplinary action as required by OPR.;
- Enbridge did not demonstrate that its reporting and immunity policy was communicated as explicitly and at the optimal level as expected by the Board; and
- Enbridge did not demonstrate that its immunity policy was adequate as it limited granting immunity to reporting compliance issues.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

## 2.0 PLANNING

### 2.1 Hazard Identification, Risk Assessment and Control<sup>1</sup>

**Expectations:** The company shall have an established, implemented and effective process for identifying and analyzing all hazards and potential hazards. The company shall establish and maintain an inventory of hazards and potential hazards. The company shall have an established, implemented and effective process for evaluating the risks associated with these hazards, including the risks related to normal and abnormal operating conditions. As part of its formal risk assessment, a company shall keep records to demonstrate the implementation of the hazard identification and risk assessment processes.

The company shall have an established, implemented and effective process for the internal reporting of hazards, potential hazards, incidents and near-misses, and for taking corrective and preventive actions, including the steps to manage imminent hazards. The company shall have and maintain a data management system for monitoring and analyzing the trends in hazards, incidents, and near-misses.

The company shall have an established, implemented and effective process for developing and implementing controls to prevent, manage and mitigate the identified hazards and risks. The company shall communicate those controls to anyone exposed to the risks.

#### References:

PCR Part II section 4, OPR sections 6.1, 6.5(1)(c),(d),(e),(f),(r),(s), 40, 47, 48

#### Assessment:

The Board expects companies to have an established, implemented and effective process for identifying and analyzing all hazards and potential hazards.

#### Identifying, Analyzing and Evaluating Hazards

Unauthorized excavation and construction projects being conducted near pipelines can present hazards to the safety of the pipeline. During the audit, Enbridge demonstrated that it undertakes several activities to identify the hazards and potential hazards along its rights-of-way (ROW) through its

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<sup>1</sup> Hazard: Source or situation with a potential for harm in terms of injury, ill health, damage to property, damage to workplace and environment, or a combination of these. Risk: Combination of the likelihood and consequence(s) of a specified hazardous event occurring.

Damage Prevention program. These activities included:

- acquiring knowledge of seasonal activities for each region in order to distribute awareness material when it will likely have the most impact;
- completing annual aerial ROW class location surveys to identify new developments and urban expansion in proximity to its ROW;
- conducting regular aerial patrols in each region for ongoing monitoring of activities and conditions along the ROW;
- implementing procedures whereby pilots report all suspected unauthorized activities to the regional offices;
- establishing an ongoing Pipeline Depth that tracks the detection and mitigation of pipeline depth of cover issues across the system; and
- recording and tracking pipeline depths in the Land Owner Information Database (LOID).

The Board has determined that Enbridge conducts activities to identify hazards and potential hazards for the Public Awareness program that are consistent with the Board's expectations.

### Hazard Inventory and Risk Assessment

The Board expects companies to establish and maintain an inventory of hazards and potential hazards. In addition, the Board expects companies to have an established, implemented and effective process for evaluating the risks associated with these hazards.

At the time of the audit, as part of an operations-wide initiative to implement its Integrated Management System, Enbridge had begun developing a risk register process for its Land Services Department which includes the Public Awareness program. During the audit Enbridge indicated that the IMS process included the requirement to develop and maintain a risk register. The Board reviewed this process in consideration of the Public Awareness program requirements found in the OPR and CSA Z662-11. During the audit Enbridge provided records of its Land Services risk register for review. Record review confirmed that the Hazard and Risk Register for Land Services contains risk descriptions, root causes, potential consequences, and the current controls in place. The Risk Register also assigns a numeric value and identifier to rank the impact of that risk on each operational group. The current risk register for Land Services outlines risks to the Public Awareness program itself as well as the risks that are to be mitigated by the Public Awareness program such as urban encroachment.

Even though the Land Services risk register was not complete at the time of the audit, documents reviewed indicated that the identified risks to the Public Awareness program were being incorporated into the process. These risks include issues that could undermine the success of the program such as landowner fatigue with respect to the public awareness activities. However, Enbridge did not demonstrate that it has implemented a documented process within its risk register for the integration and evaluation of the risks or real-time hazards associated third party activity along the ROW. Interviews confirmed that while the Damage Prevention and Public Awareness groups discuss trends in unauthorized activities they have not documented these triggers and trends in order to evaluate and incorporate them into the Public Awareness program. Also, the audit did not find any process for the risk register whereby the regional offices could report new or specific risks affecting specific areas (such as a new neighbourhood along the ROW) to the Head Office for evaluation and inclusion into the overall Public Awareness program. Instead, the current risks are at category

heading level.

Through the audit it was found that as it was still in the documentation phase, Enbridge did not have a process whereby the risks listed in the register have been evaluated as outlined in the Board's expectations.

### Control

The role of Enbridge's Public Awareness program is to establish and implement initiatives based on known hazards as well as information gathered from the activities listed above. Interviews with Enbridge staff indicated that the schedule of activities and mail-outs is based on knowledge and consideration of seasonal land maintenance activities. These Public Awareness Program mail-outs and activities include:

- a newsletter in the fall;
- a postcard in the spring;
- a calendar in the winter;
- face-to-face visits on a three-year rotation; and
- outreach engagements throughout the year with construction and excavation audiences.

### Summary

Enbridge demonstrated that it has established and implemented a Public Awareness program that is comprised of a variety of activities and introduces controls for addressing known hazards. While Enbridge was able to demonstrate that it is in the process of establishing a risk register to serve as its hazard inventory, it was not able to demonstrate that it has implemented a documented process to integrate new risks and hazards identified by ongoing initiatives in the Damage Prevention program.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

## 2.2 Legal Requirements

**Expectations:** The company shall have an established, implemented and effective process for identifying and monitoring compliance with all legal requirements that are applicable to the company in matters of safety, security and protection of the environment. The company shall have and maintain a list of those legal requirements. The company shall have a documented process to identify and resolve non-compliances as they relate to legal requirements, which includes updating the management and protection programs as required.

### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(g),(h),(i), 40, 47, 48

### Assessment:

The Board requires that companies have a process for identifying and monitoring compliance with all legal requirements and maintain a list of these requirements. At the time of the audit, Enbridge was in the process of implementing its IMS-02 Compliance and Ethics Management System which includes development of a Master Compliance Register to inventory the “primary” legal and regulatory requirements. This process will be managed by Enbridge’s Regulatory Law and Affairs Department. As this process was not fully established and implemented at the time of the audit, the evaluation of its adequacy is out of the scope for this audit.

### Identification & Monitoring Compliance

During the Audit, Enbridge indicated that it used several methods to monitor changes in legal requirements including checking government websites and participating in industry groups such as the Canadian Energy Pipelines Association.

Enbridge indicated that the identification of legal requirements also occurred as part of its operation document control practices. Enbridge indicated that identification of and monitoring compliance with legal requirements is undertaken as part of its Operations and Maintenance Manuals (OMMs) annual document maintenance processes. As per information provided by Enbridge, it identified and listed its legal requirements within its Operations and Maintenance Manuals (OMMs). The Public Awareness program Standard was found in Enbridge’s Book 1: General Compliance Reference and reported to be the guidance document for the Public Awareness program. It included a list of legislative requirements including the OPR, Part 6, Section 35 as well as the PCR section 4(1), (2) and CSA Section 10. The Board verified that Enbridge was conducting the required OMM reviews and maintenance as set out in its internal procedures. Enbridge indicated that its Health Check and Internal Review processes also review legal compliance to identified requirements. Review of the processes indicated that Health Checks are internal processes undertaken by staff not normally associated with the processes that check the identified requirements. Internal Reviews focus on compliance; however, Enbridge did not demonstrate that this process had been established or implemented.

The Board found that the methods used by Enbridge are inadequate for monitoring compliance. The Board is of the view that relying on legal lists in procedures as a method of maintaining and monitoring compliance with legal requirements does not meet the Board's requirements. This practice limits the review to those requirements already referenced within the documentation and does result in the development of a legal list as required by the OPR. As noted below, Enbridge's referenced legal lists were not adequate. Further, the Board notes that, legal requirements do not necessarily only drive procedures and that compliance cannot be ensured by incorporating appropriate legal content in procedural documents; therefore, this practice is not adequate for monitoring compliance. Further, the Health Check and Internal Review processes are presently not designed to account for all functions or processes on an adequate basis. Both processes are not designed to be comprehensive with respect to the scope of what must be included in a check or review. As noted above, Enbridge did not demonstrate that its Internal Review process has been established and implemented.

### Legal List

During the audit, Enbridge indicated that the lists of its legal requirements, as required by the Board, are contained within its Operations and Maintenance Manuals (OMMs) and the procedures contained within them. The Board reviewed the OMMs provided and found that they were being maintained as described; however, the information contained within them was inadequate. For example, NEB Order MO-21-2010, CSA Z662 – 11, clause 3 *Safety and Loss Management Systems*, NEB Administrative Monetary Penalties and NEB Act Section 112 and its 2012 amendments were not referenced. Additionally, the Board found that using multiple lists does not comply with the requirements to maintain a legal list.

### Communicating Legal Requirements

During the audit the Board identified that Enbridge had established a number of methods for communicating the legal requirements. Enbridge did not, however, demonstrate that these methods for communicating new or revised legal requirements between the head office and regional field staff and consequently third-parties were effective. Questions regarding awareness of new or revised regulatory requirements that relate to Enbridge's Public Awareness and Third Party Crossings Programs were included in the Board's interviews of Enbridge staff with program implementation responsibilities. The Board noted a lack of awareness of certain regulatory changes with potential program or public awareness information implications was identified. Examples of lack of awareness of regulatory changes included knowledge of changes to the NEB Act and the promulgation of the Administrative Monetary Penalties (AMP) Regulations. The Board notes that information regarding the AMP Regulations would normally be included in the public awareness program established to meet the requirements of section 4 of the Pipeline Crossings Regulations Part II. Company staff with responsibilities for implementing or communicating the requirements of the public awareness programs should be aware of the regulatory content included within them.

### Summary

The Board found that Enbridge demonstrated that it was tracking, listing and communicating some of its legal requirements.

The Board also found that Enbridge's methods to monitor its legal requirements and compliance to them did not meet the Board's requirements.

The Board found that Enbridge's Legal list was not maintained as a single list, was incomplete and was not kept at the level of specificity required to enable the company to ensure and monitor its compliance with the legal requirements.

The Board found that Enbridge had developed and implemented practices to communicate the legal requirements. The Board found one deficiency with Enbridge's communications practices with respect to its compliance practices. Enbridge did not demonstrate that it had an effective method for communicating new or revised legal requirements between the head office and regional field staff and consequently third-parties.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

## 2.3 Goals, Objectives and Targets

**Expectations:** The company shall have an established, implemented and effective process for developing and setting goals, objectives and specific targets relevant to the risks and hazards associated with the company's facilities and activities (i.e., construction, operation and maintenance). The company's process for setting objectives and specific targets shall ensure that the objectives and targets are those required to achieve its goals, and shall ensure that the objectives and targets are reviewed annually.

The company shall include goals for the prevention of ruptures, liquid and gas releases, fatalities and injuries, and for the response to incidents and emergency situations. The company's goals shall be communicated to employees.

The company shall develop performance measures for assessing the company's success in achieving its goals, objectives, and targets. The company shall annually review its performance in achieving its goals, objectives and targets and the performance of its management system. The company shall document the annual review of its performance, including the actions taken during the year to correct any deficiencies identified in its quality assurance program, in an annual report, signed by the accountable officer.

### References:

PCR Part II section 4, OPR sections 6.1, 6.3, 6.5(1)(a),(b), 6.6, 40, 47, 48

### Assessment

The Board expects that companies have an established, implemented and effective process for developing and setting goals, objectives and specific targets relevant to the risks and hazards associated with its facilities.

#### Goals, Objectives and Targets

The OPR does not include any specific management system process requirements for developing policies and goals. However, Enbridge has established clear management system guidance with respect to its process for developing policies and goals. At a governance level, Enbridge's IMS-01, *Governance Documentation* outlines the company's expectations for documenting key corporate policies, such as the *Strategic and Business Planning Processes*. The *Governance Documentation* also explains the company's "Planning Cascade" and associated documentation. This Planning Cascade document explains how the company links its policies and corporate vision to its performance targets and metrics. The practices described within the *Governance Documentation* process align with the Board's requirements for establishing policies, goals, objectives, targets and performance measures. While not an absolute alignment between the Board's requirements and Enbridge's internal processes it does reflect integration of the Board's requirements into Enbridge's business management practices. The Board noted that, while Enbridge had not implemented its full IMS requirements within the Lands Services department, the entire LP Division, including the Lands Services department was subject to this

practice.

During audit interviews, Enbridge staff indicated that the Liquid Pipelines Division, including the Land Services Department, support the Enbridge-wide goals of Safety and Operational Reliability and to Develop Great People. Record review indicated that the Land Services Department develops its annual Department Plan to describe the priorities as well as the opportunities, strengths, weaknesses and threats that will impact the Land Services Department's ability to meet its goals. The Land Services Department which includes the Public Awareness program develops an annual departmental plan which describes the strategy and priorities as well as the departmental targets and initiatives for the upcoming year. The 2014 Land Services Department Plan includes department metrics related to the performance of each of its program's functions. The Public Awareness program sets goals for the program related to its operational deliverables such as number of landowners visited, the number of emergency responder contacts made and number of awareness and emergency management events attended. Enbridge demonstrated that progress reports are presented to the Public Awareness Committee (PAC) which is made up of internal stakeholders from various departments on a quarterly basis. The Board also expects that a company's process for setting objectives and specific targets will ensure that the objectives and targets are those required to achieve its goals, and shall ensure that the objectives and targets are reviewed annually.

The Board determined that Enbridge's Land Services Department develops an annual plan that includes certain performance goals related to the Public Awareness program. For example, Enbridge has a goal that they will conduct face to face visits with all of their landowners on a three year rotation equating to one-third each year. While the goals are directly related to program performance and output, the Board determined that these goals are not directly related to its risks and hazards or the prevention of ruptures through the delivery of the Public Awareness program. As well, although the Public Awareness program has implemented several initiatives to support and promote the prevention of ruptures through awareness, such as the outreach activities, it has not developed targets or objectives that demonstrate that these initiatives are achieving the goals or effectively contributing to the prevention of ruptures.

### Goals Relating to OPR Section 6.3

Under the OPR, which applies to this program as per the Board's integrity and safety management program requirements, companies are specifically required to develop goals relating to goals for the prevention of ruptures, liquid and gas releases, fatalities and injuries, and for the response to incidents and emergency situations. The Board reviewed these requirements as part of its concurrent Integrity Management Program Audit and as part of this audit.

In its report for Enbridge's Integrity Management Program Audit, the Board noted the following:

“The OPR identifies that a company must have goals for preventing ruptures, liquid and gas releases, fatalities and injuries, as well as for responding to incidents and emergency situations. Although implicitly included within its *Integrity Principles*, Enbridge did not demonstrate that it had an

explicit statement of goals for preventing ruptures, liquid and gas releases, fatalities and injuries, and for responding to incidents and emergency situations as required in OPR section 6.3(1)(b). It was noted that Enbridge's *Integrity Principles* described the company's fundamental values with respect to how it manages its integrity management program. Further, The Liquids Pipelines Priorities in the annual Product Integrity *Department Plan* include a measurable end result and objectives to be achieved within a set timeframe. Priority (1) for Liquids Pipelines states that company intends to "Eliminate ruptures and reduce leaks." This statement implies preventing ruptures, liquid and gas releases, fatalities and injuries. However, it does not explicitly state that the company's goal is to prevent leaks, not just to reduce leaks. Based on the Board's review of documentation provided, Enbridge did not demonstrate that it has a policy at the governance level that explicitly establishes goals for preventing ruptures, liquid and gas releases, fatalities and injuries."

In this audit of Enbridge's Public Awareness program, the Board has identified identical issues. Additionally, the Board identified that, while Enbridge's program related goals, there is no process for the development of targets that would demonstrate its measurement of the performance of its Public Awareness program related to the prevention of ruptures. For instance, there is no process for the incorporation of the mitigation of threats identified through unauthorized activity reports, non-compliances or non-conformances identified. While there is a significant amount of work occurring to inform third parties about safe and compliant projects around its pipelines through the Public Awareness program, Enbridge was unable to demonstrate that it sets goals, objectives and targets to evaluate the performance of these various initiatives.

#### Summary

The Board found that Enbridge had established processes for the development and implementation of Goals, Objectives and Targets that align with the Board's requirements.

The Board also found that Enbridge had not established explicit goals relating to prevention of ruptures, liquid and gas releases, fatalities and injuries the protection of the environment as required by the OPR. Further, while Enbridge demonstrated that it had developed management practices that correspond to the Board's requirements and had implemented initiatives to address the issues, Enbridge did not demonstrate that it had established specific objectives, targets or performance measures that ensure that it various public awareness initiatives successfully meeting the management outcomes required.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

## 2.4 Organizational Structure, Roles and Responsibilities

**Expectations:** The company shall have a documented organizational structure that enables it to meet the requirements of its management system and its obligations to carry out activities in a manner that ensures the safety and security of the public, company employees and the pipeline, and protection of property and the environment. The documented structure shall enable the company to determine and communicate the roles, responsibilities and authority of the officers and employees at all levels. The company shall document contractors' responsibilities in its construction and maintenance safety manuals.

The documented organizational structure shall also enable the company to demonstrate that the human resources allocated to establishing, implementing and maintaining the management system are sufficient to meet the requirements of the management system and to meet the company's obligations to design, construct, operate or abandon its facilities to ensure the safety and security of the public and the company's employees, and the protection of property and the environment. The company shall complete an annual documented evaluation in order to demonstrate adequate human resourcing to meet these obligations.

### References:

PCR Part II section 4; OPR sections 6.1, 6.4, 20, 31, 40, 47, 48

### Assessment:

The Board expects companies to have a documented organizational structure that enables it to meet the requirements of its management system and its obligations to carry out activities in a manner that ensures the safety and security of the public, company employees and the pipeline, and protection of property and the environment. This structure shall enable the company to determine and communicate the roles, responsibilities and authority of the officers and employees at all levels.

#### Organizational Structure

For this audit, the NEB focused on the operational functions of the Lands Services department including Crossings, Damage Prevention and the Public Awareness program for Enbridge's Canadian federally regulated assets.

Enbridge indicated that its Public Awareness program staff in the Head Office in Edmonton report to the Lands Services department which is part of the Liquid Pipelines Division. The Public Awareness program information and requirements are developed and managed at the Head Office and executed in the regions by PLM staff and Land Agents. For the Public Awareness program, there is staff with awareness responsibilities in each of the regions. As well, there are three hub offices located in Edmonton AB, Estevan SK and Sarnia ON respectively. Each of these offices manages the public awareness related activities such as the landowner visits and outreach activities. The Enbridge South Prairie Region manages its Public

Awareness program out of its regional office in Estevan. This system is run distinctly to account for the provincially regulated gathering system. Public Awareness staff in the South Prairie Region follow the same standards established at the Head Office.

During the audit, Enbridge provided documents and records that demonstrated it had established and maintained documented roles and responsibilities statements related to its Public Awareness program and activities that applied to all levels within the organization as well as contractors.

### Annual Evaluation of Resource Need

Along with a documented organizational structure, the Board expects companies to demonstrate an ongoing ability to sustain its program. The Board requires that companies demonstrate, based on an annual documented evaluation of need, that the human resources required to establish, implement and maintain the programs are sufficient to meet operational and regulatory requirements.

Enbridge demonstrated that it uses several mechanisms to evaluate its human resources needs. In order to determine the resources required in a given year, Enbridge uses its formalized workforce planning process and associated practices. The Board identified that Enbridge evaluates its resourcing levels by examining lagging indicators, such as the number of crossing applications addressed over the previous year, and service standard measures as well as work activity projections.

Based on the information provided by Enbridge in its documents and records and during interviews, the Board identified one deficiency with respect to Enbridge's evaluation of need. During field interviews, Enbridge indicated that it uses some PLM, some contractors and Land Agents to conduct the face-to-face visits, and on-demand sessions and unauthorized activity follow-up that are part of the Public Awareness program. The Board did not identify any lack of resources for implementing the program; however, Enbridge did not demonstrate in its evaluation of need practices that is was accounting for the public awareness activities being conducted by regional resources. The Board notes that, at the time of the audit, the Land Services Department was in the process of documenting and implementing its management system for the Lands Services (IMS-19). The Board further notes there were no issues related to staffing levels or insufficient resources identified during the audit in the Head Office or Regional Offices; however, as it moves forward with the implementation of its IMS-19, Enbridge will need to consider the human resources required to maintain its management system as well as the implementation of any identified corrective actions.

### Summary

The Board found that Enbridge had a documented organizational structure and communicates the roles responsibilities and authorities of the officers and employees at all levels of the company.

The Board found that Enbridge had established and implemented several mechanisms for reviewing its Public Awareness program workforce needs. The Board did not observe any issues related to insufficient resources during this audit.

The Board also found that Enbridge's evaluation of need did not specifically account for all staff with Public Awareness program responsibilities and, therefore, did not demonstrate that the human resources allocated to establishing, implementing and maintaining its management system and meeting for meeting its requirements are sufficient.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Status: Non-Compliant**

## 3.0 IMPLEMENTATION

### 3.1 Operational Control-Normal Operations

**Expectations:** The company shall have an established, implemented and effective process for developing and implementing corrective, mitigative, preventive and protective controls associated with the hazards and risks identified in elements 2.0 and 3.0, and for communicating these controls to anyone who is exposed to the risks.

The company shall have an established, implemented and effective process for coordinating, controlling and managing the operational activities of employees and other people working with or on behalf of the company.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(e),(f),(q), 40, 47, 48

#### Assessment:

The Board requires that companies have an established, implemented and effective process for developing and implementing corrective, mitigative, preventive and protective controls associated with the hazards and risks identified in elements 2.0 and 3.0, and for communicating these controls to anyone who is exposed to the risks.

#### Development of Controls

During the audit, Enbridge indicated that its Public Awareness program had been developed and implemented to inform external stakeholders about the safe work around pipelines as well as what to do in case of emergency. Enbridge indicated that OMM Book 03-02-02 outlined the intended audience and the purpose of the Public Awareness program as well as the practices and procedures (controls) to be used to address Enbridge's public awareness needs. It included a description of the stakeholders (potential excavators, landowners, municipalities, etc.) and the various awareness tools that have been developed to correspond with known activities (Fall and Spring Newsletter, reminder letters, annual calendars and in-person visits, among others). Another example of a control introduced through the Public Awareness program is the Agricultural Vehicle and Equipment Screening Tool. This wheel was designed by Damage Prevention program staff and delivered through the Public Awareness program to assist landowners and tenants conducting agricultural activities to determine acceptable weight limits for driving agricultural vehicles across Enbridge's pipelines.

#### Summary

The Board found that, while its review of the hazard identification sub-element found deficiencies (see element 2.2 of this report), Enbridge had implemented appropriate controls to address its identified known hazards.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

**Compliance Status: Compliant**

### 3.2 Operational Control-Upset or Abnormal Operating Conditions

**Expectations:** The company shall establish and maintain plans and procedures to identify the potential for upset or abnormal operating conditions, accidental releases, incidents and emergency situations. The company shall also define proposed responses to these events and prevent and mitigate the likely consequence and/or impacts of these events. The procedures must be periodically tested and reviewed, and revised where appropriate (for example, after upset or abnormal events). The company shall have an established, implemented and effective process for developing contingency plans for abnormal events that may occur during construction, operation, maintenance, abandonment or emergency situations.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(c),(d),(e),(f),(t), 32, 40, 47, 48

#### Assessment:

The Board expects companies to establish and maintain plans and procedures to identify the potential for upset or abnormal operating conditions, accidental releases, incidents and emergency situations. The Board also expects companies to define proposed responses to these events and prevent and mitigate the likely consequence and/or impacts of these events.

#### Upset or Abnormal Operating Conditions

During the audit the Board identified that, at Enbridge, the Public Awareness program plays a role in the overall Emergency Management program. Although not directly involved in the upset conditions, the Public Awareness program had responsibilities related to the development and maintenance of activities which support the ongoing education of stakeholders including first responders. Enbridge leveraged its Public Awareness program's engagement activities, mail-outs and data to inform external stakeholders of potential emergency situations. The Board reviewed information that demonstrated that Enbridge had included emergency information such as the signs of a potential leak and the identification of potential emergency events in the safety information within its mail-outs. During the face to face visits, Enbridge representatives confirm resident information to maintain the accuracy of the Landowner Information Database (LOID) which is to be used to generate lists to be used in the event of an emergency.

Document and record reviews and staff interviews conducted by the Board confirmed that Enbridge's Public Awareness program staff participated in the development and delivery of emergency management related training material for first responders and pipeline neighbours.

The Board identified that Public Awareness staff in the field locations also provide incident support to the Emergency Management program. Interviews and document reviews confirmed that Public Awareness field staff emergency response accountabilities focusing on communications

aspects. Interviews with the field Public Awareness staff identified that they had participated in full-scale and table-top emergency exercises.

### Contingency Plans

Under the OPR, companies are required to establish and implement a process for developing contingency plans for abnormal events that may occur during construction, operation, maintenance and abandonment activities. The Public Awareness program is directly linked to the Integrity Management program that is being concurrently audited with this program. That audit identified that Enbridge did not have an established and implemented program level process for developing contingency plans as required by the OPR. As the Board has made a non-compliant finding in that audit which will cause a corrective action plan that addresses this program deficiency to be developed, the Board will not assign further non-compliance in the sub-element. Enbridge's corrective action plan developed to address that finding must specifically and explicitly consider actions to address this program's deficiency.

### Summary

The Board found that Enbridge demonstrated that its Public Awareness staff plays a role in supporting the Emergency Response program. Enbridge leveraged its awareness mail-outs and outreach activities to support its emergency response capabilities and regulatory requirements.

The Board found that Enbridge's Public Awareness staff that have responsibilities during an emergency are appropriately trained.

The Board found that Enbridge does not have a process for developing contingency plans for abnormal events that may occur during construction, operation, maintenance and abandonment activities; however, this non-compliance is addressed within its concurrent Integrity Management program and a further Non-compliant finding will not be made in this sub-element. In order to ensure that related issues are addressed for this program, Enbridge's corrective action plan must specifically and explicitly consider actions to resolve this program's deficiency.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

**Compliance Status: Compliant**

### 3.3 Management of Change

**Expectations:** The company shall have an established, implemented and effective process for identifying and managing any change that could affect safety, security or protection of the environment, including any new hazard or risk, any change in a design, specification, standard or procedure and any change in the company’s organizational structure or the legal requirements applicable to the company.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(i), 40, 47, 48

#### Assessment:

During the Audit, Enbridge indicated that it meets these requirements through its MOC process described in its Book 1 OMM 06-02-01. The Board’s review of this document identified that the purpose of this standard was to “*ensure that the necessary stakeholders are involved in the decisions pertaining to changes to facilities, equipment, processes and policies.*” Enbridge provided information during the audit that its MOC processes and requirements are embedded in all of its existing written processes, procedures and practices. Enbridge indicated that a single MOC process would not be able to meet its or other companies with significant facilities and processes, requirements. Therefore, Enbridge has multiple processes embedded in multiple locations. Further, Enbridge indicated that its interpretation of the OPR is to “ensure that a MOC process is available for unplanned, unexpected or infrequent changes that are not already embedded in existing activities and processes”. The Board interpreted this statement to indicate that the Book 1 MOC should then only apply to unplanned, unexpected changes.

The Board has found that Enbridge’s interpretation and practices are inconsistent with the Board’s interpretation of the OPR process requirements. The Board notes that the OPR requires a company to develop a management system MOC process that identifies and manages any change, not only those described by Enbridge. The Board notes that requirements for the development of a MOC process are found within the OPR and CSA-Z662 as well.

Given the parameters of the Enbridge process described above, the scope of this MOC does not meet the Board’s expectations for MOC. Specifically, it does not include the identification and management of any change that could affect safety, security or protection of the environment, including any new hazard or risk, any change in a design, specification, standard or procedure and any change in the company’s organizational structure or the legal requirements applicable to the company.

The Board reviewed Enbridge’s MOC application for the Public Awareness program. The Board found that, while the OMM review and revision process was demonstrated, it did not constitute a compliant MOC due to the failure to demonstrate that the review included new legal requirements. As discussed in Sub-Element 2.2 of this report, Enbridge did not demonstrate a process in place to ensure that changes to legal requirements are

being analyzed for integration into the procedures. The Board notes that without a process where legal changes trigger the MOC, Enbridge could not demonstrate compliance.

Additionally, based on information gathered during this and other concurrent audits, the existing process was reportedly inconsistently applied across its protection programs. Enbridge indicated that it had a project underway to implement a revised MOC as part of its Integrated Management System development that is intended to meet the Board's requirements.

#### Summary

The Board found that, while Enbridge had implemented some aspects of an MOC process and was in the process of implementing a new process, it did not demonstrate that it had established and implemented a process that meets the requirements of the OPR.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

### 3.4 Training, Competence and Evaluation

**Expectations:** The company shall have an established, implemented and effective process for developing competency requirements and training programs that provide employees and other persons working with or on behalf of the company with the training that will enable them to perform their duties in a manner that is safe, ensures the security of the pipeline and protects the environment.

The company shall have an established, implemented and effective process for verifying that employees and other persons working with or on behalf of the company are trained and competent, and for supervising them to ensure that they perform their duties in a manner that is safe, ensures the security of the pipeline and protects the environment. The company shall have an established, implemented and effective process for making employees and other persons working with or on behalf of the company aware of their responsibilities in relation to the processes and procedures required by the management system or the company's protection programs.

The company shall have an established, implemented and effective process for generating and managing training documents and records.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(j),(k),(l),(p), 40, 47, 48

#### Assessment:

The Board expects companies to have an established, implemented and effective process for developing competency requirements and training programs that provide employees and other persons working with or on behalf of the company with the training that will enable them to perform their duties in a manner that is safe, ensures the security of the pipeline and protects the environment.

#### Training Program

Through interviews and document and record review, the Board found that Enbridge has established and implemented a documented training program applicable to its Public Awareness program training of its employees. The training program is appropriately supported and managed throughout the organization. Enbridge has developed a management system called the Enbridge Learning Management System (eLMS). eLMS provides the mechanism to register, deliver, track and record learning completions. Enbridge's Human Resources department provides support to all departments for the development of departmental content and eLearning programs and each department manages the content of programs housed in eLMS. The Board verified that Enbridge has implemented the systems to generate, manage and document the various training programs through front line interviews and inspections.

While the Board acknowledges that Enbridge has a Violence in the Workplace (VIW) Policy in place as required by the *Canada Occupational*

*Health and Safety Regulations (COSHR) Part XX*, interviews with staff along the system identified that Enbridge employees were not aware that VIW training requirements must include violence from external parties. During the audit, field staff across the system reported encounters with hostile third parties. Interviews with Enbridge staff during the review of the VIW practices identified that the field staff and contractors were not aware of procedures for identifying, formally reporting or addressing aggressive behavior. The audit identified, that there was no training or procedures provided to the field staff or its contractors that outlined Enbridge's expectations for events where staff are met with hostility during their interactions with the public or third parties that would meet the requirements of the COSHR Part XX.

Due to information provided by field staff during the audit, combined with the heightened levels of scrutiny of and public attention on the company's activities, the NEB's Delegated Labour Program Official received an Assurance of Voluntary Compliance (AVC) from Enbridge to develop and implement a Violence in the Workplace Program in accordance with the requirements of the COSHR Part XX. As part of its corrective action, Enbridge demonstrated that it was developing interim measures which included providing Conflict Management and Situational Awareness training for its field staff as well as establishing long term project to satisfy the requirements of the COSHR.

As the root of this issue is a failure to identify and manage legal requirements for workers, this deficiency is addressed in the Board's concurrent Safety Management Program Audit in sub-element 2.2 *Legal Requirements* of the report for that audit. No additional non-compliance will be assigned as the corrective action plan developed for that finding will address this audit's identified deficiency.

#### Competency Process

The Board expects a company to have an established, implemented and effective process for verifying that employees and other persons working with or on behalf of the company are competent, and for supervising them, ensures the security of the pipeline; and protects the environment. Further CSA clause 3.1.2(c) requires a process for the management of resources including the establishment of competency requirements.

Notwithstanding Enbridge's training program implementation, the Board found that Enbridge had not established and implemented documented processes for developing competency that are used to develop training and learning programs and to establish baseline competencies required for employees and others working on behalf of the company to perform assigned tasks in a manner that is safe, ensures the security of the pipeline and protects the environment. Similarly, the Board found that Enbridge has not established and implemented a process for verifying competency as required. Interviews with staff indicated that there were undocumented competency evaluation processes being undertaken at the time of the audit; however, they did not meet the Board's management system process requirements. Record reviews conducted by the Board indicated that Enbridge had at one time implemented a formal Competency Based Training program but that had been officially discontinued a number of years ago. It was identified that staff in some of the regions were still implementing the practices of this program as a method to ensure competency of new staff.

The Board considers competency identification and verification to be a key component in assuring the safety of workers, the public, and the environment. Therefore, this issue was brought to Enbridge's attention as requiring urgent attention. Enbridge has responded by developing an

interim process for identifying and verifying competencies while Enbridge's Workforce Competency and Qualification Process (WCQP), commenced in 2013, is fully rolled out. This was provided to the Board for review prior to end of its close-out discussions. While not yet demonstrated as established or implemented, based on initial interviews with departmental staff, the Board found that the described practices could meet the Board's requirements.

#### Generating and Managing Training Documents and Records

The Board found that Enbridge's process for generating and managing training documents and records is largely based on the following:

- Enbridge Learning Management System – to manage department training records;
- Individual Development Plans – to manage training and records at an individual level; and

In reviewing the records, Enbridge demonstrated that it had an established, implemented and effective process for generating training documents and records.

#### Summary

The Board has found that Enbridge has established and implemented a formal management system for identifying and managing its training requirements.

The Board also found that Enbridge has not established and implemented processes for identifying and verifying the competency requirements of its workers as required in the OPR and CSA Z662-11. The Board identified that Enbridge has started to implement a new process for the identification and verification of worker competency; however, this new process remains Non-Compliant as it has not been established or implemented.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

### 3.5 Communication

**Expectations:** The company shall have an established, implemented and effective process for the internal and external communication of information relating to safety, security and environmental protection. The process should include procedures for communication with the public, company employees, contractors, regulatory agencies and emergency responders.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(m), 40, 47, 48

#### Assessment:

The Board expects that companies have established, implemented and effective process for the external communication of information relating to safety, security and environmental protection. The process should include procedures for communication with the public, company employees, contractors, regulatory agencies and emergency responders. The NEB *Pipeline Crossing Regulation, Part II* (PCR) requires:

4. (1) Every pipeline company shall establish an ongoing public awareness program to inform the public of
  - (a) the presence of the pipeline; and
  - (b) the public's responsibilities regarding any construction or installation of a facility and any excavation that might affect the pipeline.

#### External Communication

During the audit Enbridge indicated that communicating safety and awareness information with the public and external stakeholders is a main function of the Public Awareness program. Enbridge defined its affected public as “those people residing or owning land on or adjacent to the right of way, within a 200m buffer zone for HVP pipelines or that front or back onto the pipeline within 60 m on each sides of the right way for LVP pipelines.” Enbridge also includes first responders, municipalities, the excavation and construction community and other utilities to be an audience for its public awareness activities. To maintain communication with the public and its stakeholders Enbridge demonstrated that it conducted several activities to inform its external stakeholders. These activities included:

- participating in exhibits at trade and agriculture shows;
- collaborating in cooperative group initiatives with the Joint Pipeline Committee in Ontario and la Comité de Pipelines in Quebec;
- participating in regional and national common ground alliances associations;
- regular mail-outs;
- conducting awareness sessions with various stakeholder groups;
- providing information on the Enbridge website;

- answering questions that come into the Public Awareness inbox and hotline;
- the development and delivery of training and related materials for first responders;
- face to face visits conducted with residents along the ROW within 200m on HPV lines, 60m on other lines, on a 3 year frequency in each region; and
- the development and provision of pipeline safety and awareness material specifically aimed at children.

During the audit, the Board confirmed that Enbridge was implementing its Public Awareness program communications practices. The Board examined documents and records that demonstrated that Enbridge was delivering the program consistently and was taking into consideration the seasonality of the various potentially hazardous activities that could create a hazard to people or the pipeline. For example, Enbridge had developed and implemented a mail-out schedule that coincides with potential seasonal activities such as seeding and spring land maintenance in order to have its awareness materials to serve as timely reminders for the stakeholders. The Board noted that Enbridge provides bilingual material, where appropriate.

#### Internal Communication

The Board found that, at the department level, Enbridge did not demonstrate that it has a, documented communication plan that supports the effective implementation and operation of the safety and loss management system as per CSA Z662-11 clause 3.1.2(d) and as required by Enbridge's governance management system commitments.

Enbridge was able to demonstrate that there was informal internal communication occurring between all of the Lands Services groups. For example, Board review of records identified that there were regular meetings occurring where internal initiatives were discussed. The Board found, however, that the internal communications practices used by Enbridge were insufficient and did not meet the Board's requirements. During the audit, there were several examples identified that demonstrated that operational information was not being communicated both within the Lands Services department and between other Enbridge groups. For example, at the time of the audit, Enbridge's Mainline Projects group was coordinating and undertaking several hundred maintenance projects along its system. Although construction and Mainline Projects groups were not considered to be within the scope of this audit, inspections and interviews with field staff completed to inform the audit indicated that these projects impacted operations field staff and landowner relationships. Operations field staff at various locations indicated that, because they were unaware of integrity dig project deadlines and locations, they were unable to respond effectively to landowner concerns and questions. It was observed that this lack of communication and follow up between the groups and the regional offices regarding these initiatives had an impact on regional staff's ability to inform external stakeholders during the performance of regular operational duties. Another example of lack of internal communication was the failure of Enbridge to communicate the regulatory changes throughout its Lands Services organizations down to the office and field staff. As discussed in sub-element 2.1 of this report, there were uncommunicated amendments to the NEB Act, the Low Risk Crossings Order, the NEB AMP regulations that could potentially have an impact on the Public Awareness staff in the offices as well as in the field.

### Summary

The Board found that Enbridge had established and implemented external communication practices applicable to its Public Awareness program that identified the appropriate stakeholders and developed messages relating to maintaining the safety and security of the pipeline and protection of the environment.

The Board found that while Enbridge had been communicating internally, its practices were deficient. The Board found that Enbridge had not developed a communication plan that met the Board's requirements.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

### 3.6 Documentation and Document Control

**Expectations:** The company shall have an established, implemented and effective process for identifying the documents required for the company to meet its obligations to conduct activities in a manner that ensures the safety and security of the public, company employees and the pipeline, and protection of property and the environment. The documents shall include all of the processes and procedures required as part of the company's management system.

The company shall have an established, implemented and effective process for preparing, reviewing, revising and controlling documents, including a process for obtaining approval of the documents by the appropriate authority. The documentation should be reviewed and revised at regular and planned intervals.

Documents shall be revised where changes are required as a result of legal requirements. Documents should be revised immediately where changes may result in significant negative consequences.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(i),(n),(o), 6.5(3), 40, 47, 48

#### Assessment:

The Board expects companies have an established, implemented and effective process for identifying the documents required for the company to meet its obligations to conduct activities in a manner that ensures the safety and security of the public, company employees and the pipeline, and protection of property and the environment. The documents shall include all of the processes and procedures required as part of the company's management system.

During the audit, Enbridge indicated that the Public Awareness program documentation management is governed through its *Documents Policy*, which is available on the company's intranet and through an online tool called the Governance Documents Library. According to Enbridge, the Governance Documents Library was created to ensure access to the most current governance documents. Enbridge defines governance documents as "documents which lay out the expectations, standards, requirements and activities that will be demonstrated in order to support effective execution of the management system". They include standards, specifications, guides, work instructions, policies and procedures and include related documents such as checklists and templates.

Enbridge indicated that, at the program level, operational documents were housed within the OMMs. Further, Enbridge indicated that the OMMs included a document control process (*OMM Management Standard*) within them. The documented purpose of this overarching standard is to "provide a framework of standards and processes used to ensure the consistent and compliant management of the Operations & Maintenance

Manuals.” The OMM program document describes the roles and responsibilities for ensuring that procedural documentation is updated and revised on a maximum 15 month schedule. The Board identified that the OMM documents were officially available in electronic format only to ensure that staff were following the most current versions.

During the audit the Board found that Enbridge had consistently implemented the described processes and practices.

Summary

The Board found that Enbridge had established and implemented a process for controlling its program documentation.

Based on the Board’s evaluation of Enbridge’s Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

**Compliance Status: Compliant**

## 4.0 CHECKING AND CORRECTIVE ACTION

### 4.1 Inspection, Measurement and Monitoring

**Expectations:** The company shall have an established, implemented and effective process for inspecting and monitoring the company's activities and facilities to evaluate the adequacy and effectiveness of the protection programs and for taking corrective and preventive actions if deficiencies are identified. The evaluation shall include compliance with legal requirements.

The company shall have an established, implemented and effective process for evaluating the adequacy and effectiveness of the company's management system, and for monitoring, measuring and documenting the company's performance in meeting its obligations to perform its activities in a manner that ensures the safety and security of the public, company employees and the pipeline, and protection of property and the environment.

The company shall have an established, maintained and effective data management system for monitoring and analyzing the trends in hazards, incidents and near-misses. The company shall have documentation and records resulting from the inspection and monitoring activities for its programs.

The company management system shall ensure coordination between its protection programs, and the company should integrate the results of its inspection and monitoring activities with other data in its hazard identification and analysis, risk assessments, performance measures and annual management reviews, to ensure continual improvement in meeting the company's obligations for safety, security and protection of the environment.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(g),(s),(u),(v), 40, 47, 48

#### Assessment:

The Board expects companies to have an established, implemented and effective process for inspecting and monitoring the company's activities and facilities to evaluate the adequacy and effectiveness of the protection programs. The NEB PCR, Part II requires Section 4 (2) *Every pipeline company shall assess the effectiveness of its public awareness program on a regular basis and shall maintain a record of the assessment.*

#### Measurement and Monitoring

Enbridge identified that it had implemented several methods to monitor the ongoing effectiveness of its various Public Awareness activities and outputs, these included:

- landowner survey cards (by mail);

- annual assessments conducted by Public Awareness staff in each region;
- tracking feedback from Landowners, tenants and neighbours collected during visits;
- tracking feedback from outreach activities conducted; and
- external reviews and assessments conducted by third party reviews.

Enbridge provided information demonstrating that its Public Awareness program had been the subject of external reviews to assess effectiveness. The Board's review of the supplied reports contained a summary of the activities conducted, number of people contacted and by which medium. These reviews included descriptions of the Public Awareness program and its activities including a summary of the results of the consolidation of performance indicators in the Central, Western and Northern Region. Each report also included recommendations for improvements to the program.

While Enbridge demonstrated the implementation of its assessment processes, it did not demonstrate that it was managing issues raised in the assessments or other evaluation practices such as feedback submitted by the Regional Offices through to resolution either by practice or process. Based on the lack of consistent management of recommendations, the Board determined that Enbridge did not demonstrate the effectiveness of its processes.

#### Monitoring and analyzing trends

The Board expects companies to have an established, maintained and effective data management system for monitoring and analyzing the trends in hazards, incidents and near-misses. The company shall have documentation and records resulting from the inspection and monitoring activities for its programs. As well, the Board expects the management system will ensure coordination between its protection programs, and the company should integrate the results of its inspection and monitoring activities with other data in its hazard identification and analysis, risk assessments, performance measures and annual management reviews, to ensure continual improvement in meeting the company's obligations for safety, security and protection of the environment.

The Board identified that Enbridge reports unauthorized activities to the Board as required. Also, unauthorized activity trends are monitored in the regional offices and reported to the Damage Prevention Team in Edmonton for review. The required performance measures are also collected monthly from each Region and submitted to the NEB annually as part of the program's Performance Measures. In its audit, the Board noted several deficiencies with respect to monitoring and analyzing trends. Enbridge did not demonstrate a process by which Enbridge was comparing its Public Awareness program activities and practices with the number of unauthorized activities over time to analyze, monitor and trend as to whether or not the deliverables from the Public Awareness program had an impact on unauthorized activity. The Board would consider this type of analysis as a basic requirement of the expected program analysis activities. Additionally, as noted, while Enbridge was undertaking several types of activities to monitor its Public Awareness program, it did not demonstrate that there was any tracking of findings or recommendations and therefore could not demonstrate how it could integrate the results into overall management analysis.

Summary

The Board found that Enbridge was monitoring and assessing the implementation of its Public Awareness program.

The Board also found that Enbridge had not established process to monitor, manage and track the results of its assessments to conclusion.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

## 4.2 Investigating and Reporting Incidents and Near-misses

**Expectations:** The company shall have an established, implemented and effective process for reporting on hazards, potential hazards, incidents and near-misses, and for taking corrective and preventive actions. This should include conducting investigations where required or where hazards, potential hazards, incidents and near-misses have or could have resulted in the safety and security of the public, company employees and the pipeline, and protection of property and the environment, being significantly compromised.

The company shall have an established, maintained and effective data management system for monitoring and analyzing the trends in hazards, incidents and near-misses.

The company should integrate the results of its reporting on hazards, potential hazards, incidents and near-misses with other data in hazard identification and analysis, risk assessments, performance measures and annual management reviews, to ensure continual improvement in meeting the company's obligations for safety, security and protection of the environment.

### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(r),(s),(u),(w),(x), 40, 47, 48, 52

### Assessment:

The Board requires that companies have an established process for reporting on hazards, potential hazards, incidents and near-misses that occur on its regulated facilities. The Board also expects companies to have an established, maintained and effective data management system for monitoring and analyzing the trends in hazards, incidents and near-misses.

### Reporting on hazards, potential hazards, incidents and near-misses

During the audit Enbridge demonstrated that, for the Enbridge Lands Services department, near misses or unauthorized activities are reported in accordance to the NEB PCR requirements. Enbridge demonstrated that, once notified, Enbridge Land Agents and field staff in the regional offices conducted follow-up investigation on each unauthorized activity with all parties involved to determine if damage to the facilities or environment had occurred and to provide additional public awareness material. Through document and record reviews, the Board confirmed that Enbridge had procedures in place for reporting and tracking any unauthorized activities. According to Enbridge, unauthorized activity reports were submitted to the Damage Prevention Group for tracking. Legal services issued the Notifications of the potential unauthorized activity.

### Trending and Analysis

The Board expects companies to have an established, maintained and effective data management system for monitoring and analyzing the trends in hazards, incidents and near-misses.

Enbridge identified that its Damage Prevention program received all of the unauthorized activity reports. At the time of the audit, the unauthorized activities were being tracked in a spreadsheet; however, during the audit, Enbridge provided a demonstration of its EnCompass data management system that it indicated it was in the process of expanding to include unauthorized activities. No issues were identified with Enbridge's present or proposed practices for managing its data.

The Board did identify two issues with respect to data management and analysis. As noted previously in section 4.1 *Inspection, Measurement and Monitoring*, Enbridge did not have an appropriate process for analyzing and evaluating the effectiveness of its program activities based on the results of its program assessments. Additionally, as discussed in sub-element 3.5 of this report, Enbridge did not have a documented process for communicating trends between its Damage Prevention and Public Awareness programs. As the Board has made a non-compliant finding in each of the referenced sub-elements that will cause corrective action plans that address these deficiencies to be developed, the Board will not assign further non-compliance in the sub-element. Therefore, Enbridge's corrective action plans to address those findings must specifically and explicitly consider actions to address this program's related deficiencies.

#### Summary

The Board found, notwithstanding the deficiencies linked to its Non-Compliant findings made for sub-elements 3.5 *Communication* and 4.1 *Inspection, Measurement and Monitoring*, Enbridge has established appropriate practices for conducting investigations and managing reports of incident and near-misses associated with its Public Awareness program.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has not found any issues of Non-Compliance. The Board has determined that Enbridge is Compliant with this sub-element.

**Compliance Status: Compliant**

### 4.3 Internal Audits

**Expectations:** The company shall have an established, implemented and effective quality assurance program for its management system and for each protection program, including a process for conducting regular inspections and audits and for taking corrective and preventive actions if deficiencies are identified. The audit process should identify and manage the training and competency requirements for staff carrying out the audits.

The company should integrate the results of its audits with other data in hazard identification and analysis, risk assessment, performance measures and annual management review, to ensure continual improvement in meeting the company's obligations for safety, security and protection of the environment.

**References:** PCR Part II section 4; OPR sections 6.1, 6.5(1)(w),(x) 40, 47, 48

#### **Assessment:**

The Board expects companies to have an established, implemented and effective quality assurance program for each protection program, including a process for conducting regular inspections and audits and for taking corrective and preventive actions if deficiencies are identified.

#### Quality Assurance Program

Enbridge has established a review process for the Public Awareness program that includes annual internal reports from each region, stakeholder feedback mechanisms and external assessments, including audits. There is also a "health check" process that Enbridge intends to apply to the Public Awareness program once it has implemented its IMS-19 to assess the program's conformance to its own processes and goals.

Enbridge also conducts periodic stakeholder surveys to gauge the level of understanding among its stakeholder. Interviews with Head Office staff indicate that Enbridge conducts periodic assessments of effectiveness of its Public Awareness program. It also uses the face-to-face visits and mail-in cards to obtain feedback from its external stakeholders. Internally, the Public Awareness Committee (PAC) consists of internal stakeholders, According to its committee charter, this PAC sets the deliverables and reviews the results of the Public Awareness program.

Enbridge's Public Awareness program assessments are divided into four sections according to stakeholder groups. These sections are:

1. Landowners, tenants, all neighbours (except those in apartment buildings);
2. Occupants in apartment buildings;
3. Contractors (special events); and
4. Agencies.

Enbridge was able to demonstrate that its Public Awareness program has been the subject of internal reviews and assessments. For example, in 2011,

the Public Awareness program was the subject of a program review which included a review of the program objectives and a summary of activities conducted in each of the regions. In 2013, the Public Awareness program for the Northern Region was conducted which included the unique considerations and audiences in the North.

While these reports contain a summary of the activities such as how many mail-outs were sent or meetings were conducted, there is no assessment of whether or not the program has met any targets or objectives. As required by CSA Z662-11 the Board found that, while each of these reports contains recommendations for continual improvement of the program, Enbridge did not demonstrate that it had a process to review, assess, track or resolve these recommendations.

### Internal Audit

The Board issued Order SO-E101-003-2013 to Enbridge on 10 June 2013. Condition 3 of the Order directed Enbridge to contract an independent third party expert to conduct an audit of its Public Awareness program. Enbridge was directed to develop and implement a corrective action plan to address any recommendations made by the audit. Enbridge has complied with this direction and is in the process of implementing its corrective action plan. Enbridge has therefore met the requirements of CSA Z662 with respect to conducting an audit of this program.

The Board notes; however, that based on this audit and the Board's four concurrent OPR audits of Enbridge's Safety, Integrity and Emergency Management programs and its Environmental Protection program, Enbridge does not presently have a process for conducting audits that is satisfactory to the Board. Enbridge should consider this as it moves forward with this program. The Board further notes that this program has not been the subject of a compliance audit. The Board considers conducting compliance audits to be a common and appropriate management system practices and, if Enbridge had conducted one, should have identified many of the deficiencies identified by the Board's audit.

### Summary

Enbridge demonstrated that its Public Awareness program is the subject of various reviews and assessments. The Board found, however, that Enbridge was not tracking or managing the recommendations arising from the reviews and assessments through to resolution. The Board therefore found that Enbridge's review processes were not effective and Non-Compliant with CSA Z662-11.

The Board found that Enbridge's Public Awareness program had been audited in 2014.

The Board also found that Enbridge's process for conducting audits did not meet the Board's requirements.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

#### 4.4 Records Management

**Expectations:** The company shall have an established, implemented and effective process for generating, retaining, and maintaining records that document the implementation of the management system and its protection programs, and for providing access to those who require them in the course of their duties.

#### References:

PCR Part II section 4; OPR sections 6.1, 6.5(1)(p), 40, 47, 48

#### Assessment:

The Board requires companies to have an established, implemented and effective process for generating, retaining, and maintaining records that document the implementation of the management system and its protection programs, and for providing access to those who require them in the course of their duties.

At the time of the audit, Enbridge was implementing a new corporate level management system (IMS-01) across the organization. The program level management system for Land Services (IMS-19) was under development, and not yet rolled out. As a result, the audit reviewed the practices and procedures that were in use at the time including the records management procedures.

Through interviews and document and record reviews, the Board confirmed that the Lands Services programs were managing their records in accordance with the existing *Records Management Policy, Records Retention Schedule and the Records Retention Schedule Development and Sustainment Standard*. These policies are managed by Enbridge Records Management.

During the audit, Enbridge demonstrated that records generated for and in performance of the Public Awareness program were kept and managed both regionally and centrally in Edmonton. As part of its demonstration of compliance Enbridge demonstrated its Landowner Information Database (LOID). LOID is web-based and is used to manage Enbridge's stakeholder and landowner property contact information and was demonstrated to be accessible across Enbridge's system. Enbridge indicated that LOID can be used to track landowner contact histories lands related issues concerns and technical information such as depth of cover or integrity digs occurring on a particular parcel of land. Additionally, Enbridge demonstrated that LOID can also be used to generate line lists to identify potentially affected stakeholders in the event of an emergency.

#### Summary

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Compliant with this sub-element.

**Compliance Status: Compliant**

## 5.0 MANAGEMENT REVIEW

### 5.1 Management Review

**Expectations:** The company shall have an established, implemented and effective process for conducting an annual management review of the management system and each protection program and for ensuring continual improvement in meeting the company's obligations to perform its activities in a manner that ensures the safety and security of the public, company employees and the pipeline, and protection of property and the environment. The management review should include a review of any decisions, actions and commitments which relate to the improvement of the management system and protection programs, and the company's overall performance.

The company shall complete an annual report for the previous calendar year, signed by the accountable officer, that describes the performance of the company's management system in meeting its obligations for safety, security and protection of the environment and the company's achievement of its goals, objectives and targets during that year, as measured by the performance measures developed under the management system and any actions taken during that year to correct deficiencies identified by the quality assurance program. The company shall submit to the Board a statement, signed by the accountable officer, no later than April 30 of each year, indicating that it has completed its annual report.

**References:**

PCR Part II section 4; OPR sections 6.1, 6.5(1)(w),(x), 6.6, 40, 47, 48

**Assessment:**

*(The sub-element is attributed to companies' senior management and Accountable Officer; therefore, the Board does not break up its review into governance and program levels.)*

Annual Management Review

During the audit, Enbridge indicated that IMS-01 Section 4.3 outlines the Management System Review Process to ensure that each management system is reviewed on annual basis to confirm that desired results are being achieved. Enbridge also indicated that an additional process, PC-1801 Accountable Officer Report Development Process, is also used to evaluate the management system with the output being the Annual Report.

Upon review of the various processes and records supporting the implementation therein, the Board notes the following:

- IMS-01 Management System Review Process is not fully established as defined by Enbridge standards as all process steps were considered to be aspirational;
- Although still in draft, IMS-19 does not include a management review process in its current format;
- PC-1801 Accountable Officer Report Development Process is not referenced or inferred in IMS-01 or IMS-19 and thus is not integrated into Enbridge's management system;
- PC-1801 Accountable Officer Report Development Process is not established as per the NEB's working definition (approval date on the document is 21 October 2014); and
- Evidence was not provided to demonstrate that an annual management review of the Public Awareness program has occurred.

Based on the Board's evaluation of Enbridge's Management System and the Public Awareness program against the requirements, the Board has determined that Enbridge has not established and implement a process for conducting an annual review of the management system and protection program. Enbridge will have to develop corrective actions to address the described deficiencies.

#### Management System Evaluation

While the Board has listed this requirement under sub-element 4.1 of the Protocol, Enbridge indicated during the audit that their IMS-01 Management System Review Process is also used to evaluate the adequacy and effectiveness of their management system. When reviewing the content of this governance process, Enbridge indicates that each process within the management system is reviewed to ensure effectiveness. In addition, Enbridge has developed an additional process, PC-1701 Management System Evaluation Process, which includes an evaluation of the adequacy and effectiveness of the overall management system. Records provided to demonstrate the implementation of each of these processes include:

- 2013 Internal Management System Alignment Assessment; and
- 3<sup>rd</sup> Party Assessment (Dynamic Risk) completed in 2013.

Upon review of the various processes and records supporting the implementation therein, the Board notes the follow:

- IMS-01 Management System Review Process is not fully established as defined by Enbridge standards as all process steps were considered to

be aspirational;

- IMS-01 Management Review Process does not include an evaluation of the adequacy of the management system;
- PC-1701 Management System Evaluation Process is not referenced or inferred in IMS-01 or IMS-19 and thus is not integrated into Enbridge's management system;
- Although in draft, IMS-19 does not have a management review process in its current format;
- Internal Management System Alignment Assessment does speak to an assessment of adequacy, effectiveness and implementation of processes but is based on the OPR requirements and not an evaluation of Enbridge's management system as designed; and
- 3<sup>rd</sup> Party Assessment (Dynamic Risk) is strictly an alignment/compliance assessment to the OPR 6.1-6.6 requirements and does not attest to the adequacy or effectiveness of Enbridge's management system (IMS 01 et al).

Based on the Board's evaluation of Enbridge's Management System and the Public Awareness program against the requirements, the Board has determined that Enbridge has not established and implement a process to evaluate the adequacy and effectiveness of the management system. Enbridge will have to develop corrective actions to address the described deficiencies.

#### Annual Report

Annually, Enbridge develops an "Annual Accountable Officer Report (AO Report)" describing the performance of its management system in meeting its obligations for safety, security and protection of the environment and the company's achievement of its goals, objectives and targets during that year, as measured by the performance measures developed under the management system and any actions taken during that year to correct deficiencies identified by the quality assurance program. The PC-1801 Accountable Officer Report Development Process describes the process required to develop the AO Report. The process states that the AO report must "detail the performance of Enbridge LP management system and will cover areas of leadership, performance measures, internal review, management review and corrective actions taken." The report also is to include details regarding achievement of goals, objectives and targets during that year as assessed through performance measures.

The PC-1801 Accountable Officer Report Development Process includes the requirement that Enbridge must complete its AO Report, have it signed by the accountable officer, and submit it to the Board no later than April 30<sup>th</sup> of each year. NEB auditors confirmed that the AO Report covering the 2013 performance year was signed by the accountable officer, and submitted to the Board by April 30, 2014.

Upon review of the Annual Report, the Board notes that while the report does make reference to some of the internal and external reviews conducted on the management systems as well as section that states the actions taken that year to address deficiencies, these deficiencies and actions items are not specified and are focused on the development and status of the management system. While this information is important to communicate to the Accountable Officer, it is not fully representative of Board's quality assurance program requirement (see sub-element 4.3) and thus is it unclear whether the Accountable Officer is aware of the actions taken that year to address deficiencies identified by the quality assurance program. The Board also notes that the deficiencies identified in sub-elements 1.2 and 2.3 will also need to be reflective in future Annual Reports.

### Management Responsibility

Further to the review of these processes and activities, the Board notes that some of the Non-Compliant findings relate to issues that are the responsibility of the company's senior management (as represented by its accountable officer). Examples of these issues include findings related Sub-elements *1.2 Policy and Commitment Statements and 2.3 Goals, Objectives and Targets* that relate to the development of explicit policies and goals required by the OPR. While the Board's Non-Compliant findings are mitigated by the nature of the deficiencies (implicit inclusion vs. explicit requirements), it is the responsibility of company management to ensure the development and implementation of compliant policies and goals that guide the company's management system and programs.

### Summary

The Board found that Enbridge had developed processes for and undertaken activities relating to its Management Review responsibilities.

The Board also found that some of Enbridge's Non-Compliant findings in this report are the responsibility of Enbridge's senior management.

Based on the Board's evaluation of Enbridge's Public Awareness program against the requirements, the Board has determined that Enbridge is Non-Compliant with this sub-element. Enbridge will have to develop corrective actions to address the described deficiencies.

**Compliance Status: Non-Compliant**

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<sup>i</sup> The “References” in this table contain specific examples of the legal requirements applicable to each element but are not exhaustive and do not represent a complete list of all applicable legal requirements audited to, which are found within the NEB Act and its associated regulations, as well as other applicable legislation, technical and other standards including the *Canada Labour Code* and CSA Z662, and any conditions contained within applicable certificates or orders enforced by the Board.

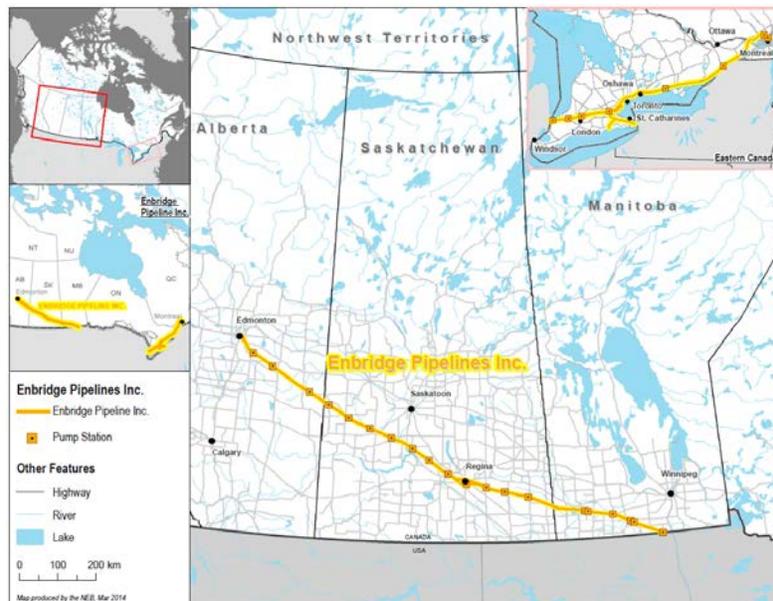
**APPENDIX II**  
**ENBRIDGE PIPELINES INC.**  
**MAPS AND SYSTEM DESCRIPTIONS**

Enbridge Pipelines Inc. and its subsidiaries included in the scope of this audit included specifically:

- Enbridge Pipelines Inc.;
- Enbridge Bakken Pipeline Company Inc. on behalf of Enbridge Bakken Pipeline Limited Partnership;
- Enbridge Southern Lights GP Inc. on behalf of Enbridge Southern Lights LP;
- Enbridge Pipelines (NW) Inc.; and
- Enbridge Pipelines (Westspur) Inc.

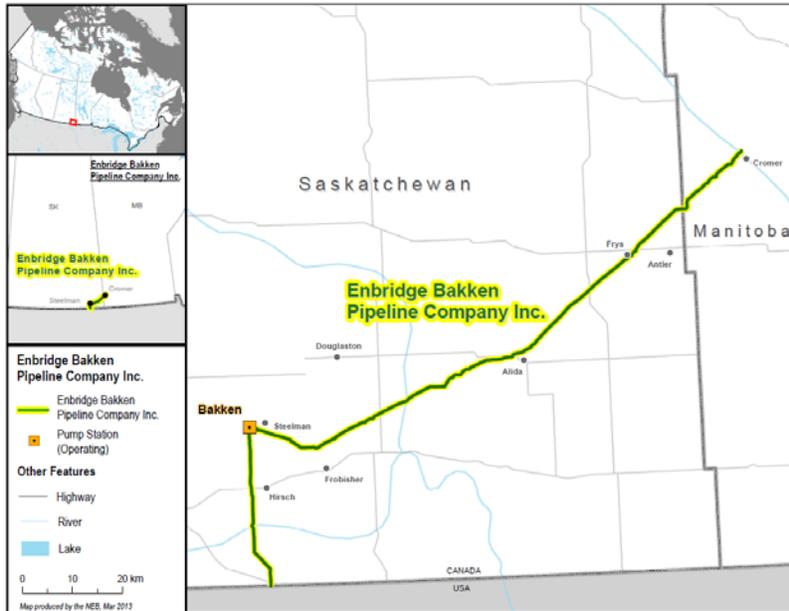
These subsidiaries hold the certificates for Enbridge’s NEB-regulated facilities.

**Figure 1: Enbridge Pipelines Inc.**



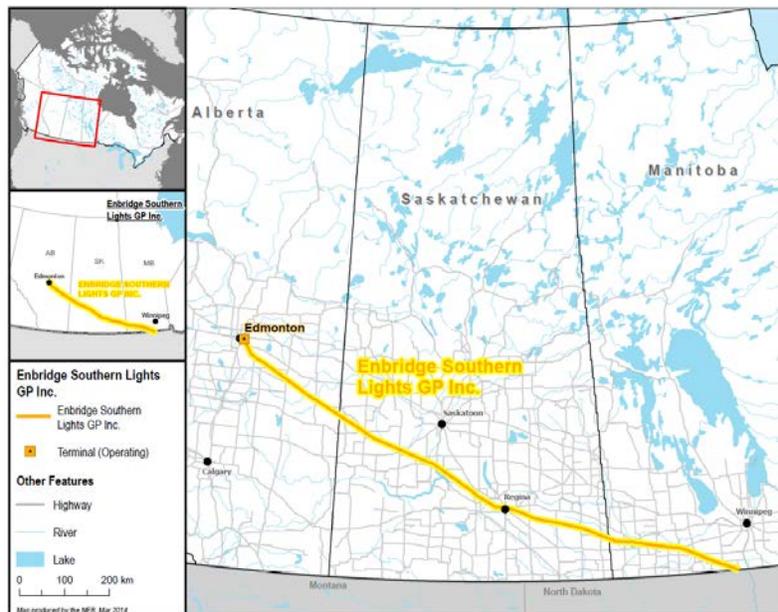
The Enbridge pipeline system, shown in Figure 1, is 7,747.04 km of oil pipelines that extend from Edmonton, Alberta, to Montréal, Québec, connecting with other oil pipelines in the United States at the Manitoba/North Dakota and Michigan/Sarnia Ontario borders.

**Figure 2: Enbridge Bakken Pipeline Company Inc.**



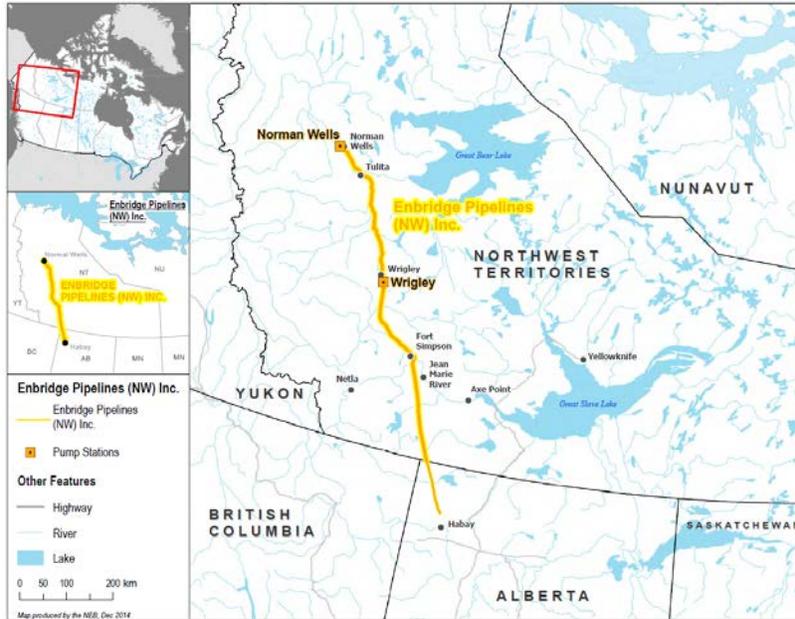
The Enbridge Bakken pipeline, shown in Figure 2, is a 157.28 km pipeline that transports oil from Cromer, Manitoba to the Saskatchewan/North Dakota border. The Enbridge Bakken pipeline continues into the United States.

**Figure 3: Enbridge Southern Lights GP. Inc**



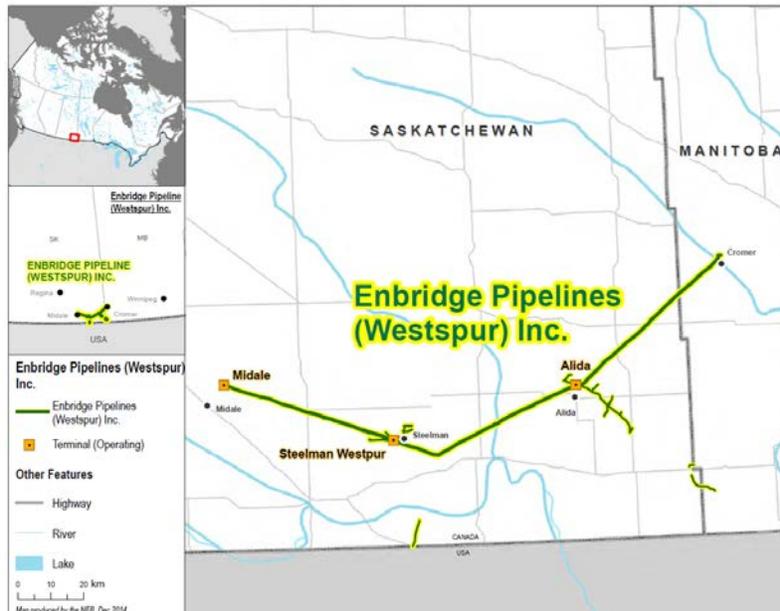
The Enbridge Southern Lights pipeline, shown in Figure 3, is a 1529.75 km pipeline that transports oil from Edmonton Alberta to the Manitoba/North Dakota border. The Enbridge Southern Lights pipeline continues into the United States.

**Figure 4: Enbridge Pipelines (NW) Inc.**



The Enbridge (NW) pipeline, shown in Figure 4, is a 854.65 km pipeline that transports oil from Norman Wells, Northwest Territories into Northern Alberta.

**Figure 5: Enbridge Pipelines (Westspur) Inc.**



The Enbridge Westspur pipeline, shown in Figure 5, is a 483.33 km pipeline that transports oil and gas from Midale Saskatchewan to Cromer Manitoba.

**APPENDIX III**  
**ENBRIDGE PIPELINES INC.**  
**COMPANY REPRESENTATIVES INTERVIEWED – PUBLIC AWARENESS**  
**PROGRAM**

<b>Company Representative Interviewed</b>	<b>Job Title</b>
██████████	Land Information Management Senior Advisor
██████████	Director Leadership & LS
██████████	Supervisor, Right-of-Way Services, Eastern Region
██████████	Director HR Business Support
██████████	Safety Coordinator
██████████	S.M.T
██████████	Senior Director RCIM
██████████	Hardisty Operations Coordinator
██████████	Engineer Pipeline Compliance
██████████	Electrical Maintenance
██████████	Supervisor PLM Services
██████████	Safety Coordinator
██████████	Microprocessor Coordinator
██████████	Public Awareness Coordinator EPSI
██████████	PLM
██████████	Operations Coordinator Cromer Area
██████████	Senior Electrical Technician
██████████	Manager Pipeline Compliance

Dale Burgess	Vice President Canadian Operations
[REDACTED]	Manager RINI
[REDACTED]	Supervisor Engineering
[REDACTED]	Kerrobert Area Supervisor
[REDACTED]	Compliance Coordinator
[REDACTED]	Director
[REDACTED]	Manager RS&D
[REDACTED]	Senior Engineer
[REDACTED]	Supervisor PLM Services
[REDACTED]	Public Awareness Advisor
[REDACTED]	Supervisor Compliance RCIM
[REDACTED]	Senior Manager Community Relations
[REDACTED]	Manager Learning Solutions
[REDACTED]	Senior Mechanical Technician
[REDACTED]	Manager Media Relations
[REDACTED]	Manager RS&D
[REDACTED]	Sr. Electrical Technician
[REDACTED]	Internal Audit Manger
[REDACTED]	Sr. Electrical Technician
[REDACTED]	S.M.T
[REDACTED]	Senior Mechanic
[REDACTED]	S.M.T
[REDACTED]	Sr. Mechanical Technician

██████████	Leader OMM Management
██████████	Director, Eastern Region
██████████████████	Coordinator Maintenance Services - Sarnia
██████████████	Supervisor Operation Training
██████████	Manager Edmonton
██████████████	Kerrobert Maintenance Coordinator
██████████	PLM
██████████	Compliance Coordinator EPSI
██████████████	Director EPSI
██████████████████	Kerrobert PLM
██████████████	Damage Prevention Advisor
██████████████	Leader Internal Coms (LP)
██████████████	Senior Manager Risk Management
██████████████	Senior Manager O&M Service
██████████████	Compliance Coordinator
██████████████	Supervisor P/L Services
██████████████	Manager Reg. Services
██████████████	Manager RSS
██████████████	Training Coordinator
██████████████	PLM Supervisor
██████████████████	Senior Electrical Technician
██████████████████	Director Land Services
██████████	Community Relation Specialist

[REDACTED]	Ethics and Compliance Officer
[REDACTED]	Manager Integrated Management Governance
[REDACTED]	Director Central Region
[REDACTED]	Area Operations Manager
[REDACTED]	Kerrobot PLM
[REDACTED]	Advisor LP H&S
[REDACTED]	Sr. Mechanical Technician
[REDACTED]	Manager Area Operations
[REDACTED]	PLM QMS Manager
[REDACTED]	Damage Prevention Inspector
[REDACTED]	Senior Mech. Technologist
[REDACTED]	PC Analyst
[REDACTED]	Area Supervisor
[REDACTED]	PLM Services - Westover
[REDACTED]	Senior Manager Strategic Planning
[REDACTED]	PLM
[REDACTED]	Manager Communications Enterprise
[REDACTED]	Senior Manager Compliance
[REDACTED]	Crossing Coordinator
[REDACTED]	Emergency Response Coordinator
[REDACTED]	PLM Services - Westover
[REDACTED]	Damage Prevention Supervisor
[REDACTED]	Director Environment

[REDACTED]	Engineering Supervisor Compliance
[REDACTED]	Senior Compliance Specialist
[REDACTED]	Senior Integrity Engineer
[REDACTED]	Senior Manager Integrated Management
[REDACTED]	Sarnia Operations
[REDACTED]	Team Lead Crossings
[REDACTED]	Area Manager Midale/Weyburn
[REDACTED]	Senior Manager Regional Services
[REDACTED]	Safety Coordinator
[REDACTED]	Senior Electrical Technician
[REDACTED]	Pipeline Compliance Specialist
[REDACTED]	Hardisty Maintenance Coordinator
[REDACTED]	Manager Land Services Canadian Operations
[REDACTED]	Right of Way Agent
[REDACTED]	Pipeline Integrity
[REDACTED]	Kerrobert PLM
[REDACTED]	PLM

**APPENDIX IV**  
**ENBRIDGE PIPELINES INC.**  
**DOCUMENTS REVIEWED\* –PUBLIC AWARENESS PROGRAM**

NAME
2.3 Goals, Objectives, and Targets
2.4 Organizational Structures, Roles, and Responsibilities
2013 Enbridge Pipelines, Canadian Class Location Change Survey Rev 0
2013 Land Agent Orientation
2013 PAP satus report
2014 Audit IR Response Status Check_041014
2014 Eastern Helicopter Planning Schedule
2014 NEB Audit - All Asset Registry - Eastern Region
2014 NEB Audit - All Asset Registry - EPSI Region
2014 NEB Audit - All Asset Registry - Northern Region
2014 NEB Audit - All Asset Registry - Western Region
2014 NEB Audit - Asset Registry - Central Region
2014 NEB Audit - Central Region Org Chart
2014 NEB Audit - Central Region PSV's
2014 NEB Audit - Central Region Stations and Terminals
2014 NEB Audit - Eastern Region Org Chart
2014 NEB Audit - Pipe Asset Registry - Central Region
2014 NEB Audit - Pipe Asset Registry - Eastern Region
2014 NEB Audit - Pipe Asset Registry - EPSI Region
2014 NEB Audit - Pipe Asset Registry - Northern Region
2014 NEB Audit - Pipe Asset Registry - Western Region
2014 NEB Audit -Eastern Region PSV's
2014 NEB Audit -Eastern Region Stations and Terminals
2014 NEB Audit -EPSI PSV's
2014 NEB Audit -EPSI Region Org Chart
2014 NEB Audit -EPSI Stations and Terminals
2014 NEB Audit -Field Operations Services Org Chart
2014 NEB Audit Information Exchange Agenda - Emergency and Security Management
2014 NEB Audit Information Exchange Agenda - Environment Management
2014 NEB Audit Information Exchange Agenda - Integrity Management Program
2014 NEB Audit Information Exchange Agenda - Public Awareness and Crossings

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\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

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\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

2014 NEB Audit Information Exchange Agenda - Safety Management System V2
2014 NEB Audit -Northern Region Org Chart
2014 NEB Audit -Northern Region PSV's
2014 NEB Audit -Northern Region Stations and Terminals
2014 NEB Audit -Northern Region Sump Tanks
2014 NEB Audit -Western Region Org Chart
2014 NEB Audit -Western Region PSV's
2014 NEB Audit -Western Region Stations and Terminals
2014 NEB Audit -Western Region Sump Tanks
2014-481 Seismic Permission_Redacted
2014-482 Seismic Permission_Redacted
2014-595 Seismic Permission_Redacted
2014-754 Seismic Permission_Redacted
22797_Utility_Energy_Services_Joint_Work_Auth1_Redacted
4.4 GV D Email Management Policy V01
4.4 GV D Records Discovery Policy V01
4.4 GV D Records Management Policy V01
4.4 GV D Records Retention Schedule V01
4.4 GV D Retention Schedule Development Sustainment Standard V01
4.4_GV_ Documents and Records Summary
4.4_GV_Response to NEB IR No 1
Action Items from Supervisor Mtg - May 221st
ASR Rating Blue Sky Air 2013-10-03
Att GV 2 - Inventory of Hazards and Potential Hazards
Att GV 3 - Identifying and Communicating Legal Requirements
Att GV 4 - Field Operations Training Update
Att GV 5 - Interim Training Verification Solution (Electrical Role)
Att GV 6 - Process for Developing Competency and Training Program
B Sangster IS Networld Updates_Redacted
Baron Apr sked
Baron Aug sked
Baron Feb sked
Baron Jan sked
Baron Jul sked
Baron Jun sked
Baron Mar sked
Baron May sked
Baron Sept sked
Blue Sky Air Ltd 2013-Oct-03
Central Region Aerial Patrol Reports May June 2014
Central Region proximity and crossing records_Redacted
Central Region Scorecards March to June2014_Redacted

\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

Central Region unauthorized crossings 20132014_Redacted
CentralRegioncrossingsFLHAexamples
Certification History by People Leader Logged In
Compliance Coordinator job description
Compliance_Coordinator_job_description_August_1_2011
CR_3 1_R_Capability Roadmap Final Document_V01_Redacted
CR_3.1_R_Crossing Management Workshop Summary_V01
Eastern Region Locate Crossing Request History
Eastern Region Locate Process
Employee Type by Region
Enbridge Assets by NEB Entity
Enbridge Final Responses to close-out discussion
Enbridge Mainline Patrols_Western, Central and Northern
EPR Apr sked
EPR Aug sked
EPR Feb sked
EPR Jan sked
EPSI Site Specific OMM - One Call Procedures
Events plan schedule for 2013-14
Final NEB Pipeline Performance Measures 2013 (2).pdf
FLHA Crossings Example
Flight Record Log
GV 1 2 Documents and Records Summary
GV 1.2 D IMS 01 Governing Policies and Processes
GV 1.2 Response to NEB IR No 1
GV 2 3 Response to NEB IR No 1
GV 2.1 D IMS-01 Governing Policies and Processes V1.0
GV 2.1 D LP Mainline Risk Modeling Presentation - 3-28-2014
GV 2.1 Documents and Records Summary
GV 2.1 Response to NEB IR No 1
GV 2.2 D IMS-01 Governing Policies and Processes V1.0
GV 2.2 D IMS-02 Compliance and Ethics Management System V1.0
GV 2.2 Documents and Records Summary
GV 2.2 R Legal Updates elink page V1.0
GV 2.3 D IMS-01 Governing Policies Processes
GV 2.4 Document and Records Summary
GV 2.4 Response to NEB IR No. 1
GV 3 3 Response to NEB IR No 1
GV 3 5 Response to NEB IR No 1
GV 3.3 D OMS Appendix IV Change Management Process V01
GV 3.3 D OMS Operating-Maintenance Procedures Management Standard Document V01
GV 3.3 D OMS Operating-Maintenance Procedures Management System Document V01

\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

GV 3.3 R CriticalUpdate Bk7 V9 2013-12-31 REV12-13 MEMO V01
GV 3.3 R Deviation B3 06-03-20 CAN 2012-09-14 V01
GV 3.4 HR - Response to NEB IR No. 1
GV 3.4 HR Documents and Records Summary
GV 3.4 OPS - Documents and Record Metadata Table
GV 3.4 OPS - Response to NEB IR No. 1
GV 3.5 Documents and Records Summary
GV 3.6 D Document Owner-Stakeholder List V01
GV 3.6 R Annual Review Schedule V01
GV 3.6 R Annual Update Bk7 V9 2011-12-01 MEMO V01
GV 3.6 R BOOK 7 Change Markups 2013-12-15 V01
GV 3.6 R CriticalUpdate Bk7 V9 2013-12-31 REV12-13 MEMO V01
GV 3.6 R FORM-B0-D-001_DEVIATION REQUEST FORM
GV 3.6 Response to NEB IR No 1
GV 4 1 Response to NEB IR No 1
GV 4 2 Response to NEB IR No 1
GV 4.1 D IMS 01 Governing Policies and Processes
GV 4.2 D IMS 01 Governing Policies and Processes
GV 4.3 D 1. Cover
GV 4.3 D 2. Table of Contents
GV 4.3 D Chapter 1 Who We Are
GV 4.3 D Chapter 2 Introduction to Paisley GRC
GV 4.3 D Chapter 3 Audit Plan Development
GV 4.3 D Chapter 4 Audit Planning Engagement Phase
GV 4.3 D Chapter 5 Audit Program and Fieldwork
GV 4.3 D Chapter 6 Document Review and Approval
GV 4.3 D Chapter 7 Audit Report and Close
GV 4.3 D Chapter 8 Condition Tracking and Action Plans
GV 4.3 D Chapter 9 Time Reporting and Audit Administration
GV 4.3 D IMS 01 Governing Policies and Processes
GV 4.3 D PC-1001 Internal Stakeholder Department Reviews Procedure
GV 4.3 D PC-1003 Integrated Review Practice
GV 5 0 Document and Record Summary
GV 5 0 Response to NEB IR No 1
GV 5.0 D IMS 01 Governing Policies and Processes
GV_1. 1_Documents and Records Summary
GV_1.1_R_2014 03 31 Letter to NEB Accountable Officer - Enbridge Bakken Pipeline Company Inc
GV_1.1_R_2014 03 31 Letter to NEB Accountable Officer - Enbridge Inc
GV_1.1_R_2014 03 31 Letter to NEB Accountable Officer - Enbridge Pipelines (NW) Inc
GV_1.1_R_2014 03 31 Letter to NEB Accountable Officer - Enbridge Pipelines (Westspur)
GV_1.1_R_2014 03 31 Letter to NEB Accountable Officer - Enbridge Southern Lights
GV_1.2_D_ IMS 07 Emergency and Security Management System V1.0

\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

GV_1.2_D_IMS-04 Occupational Health and Safety Management System_V01
GV_1.2_D_LP Scorecard 2013 Nov 13_Redacted
GV_1.2_D_PIMS (IMS-09) Framework_V01
GV_1.2_R_Compliance Policy
GV_1.2_R_LP Scorecard 2013 Nov 13_Redacted
GV_1.2_R_Statement on Business Conduct
GV_2.1_D_Department Risk Management Process Description
GV_2.1_D_Department Risk Management Process Map
GV_2.1_D_High Consequence Area Definitions (March 3rd 2011)
GV_2.1_D_LP Risk Report Management Process Description
GV_2.1_D_LP Risk Report Management Process Map
GV_2.1_D_Risk Management Policy
GV_2.1_D_Risk Management Processes
GV_2.1_R_Liquid Facility Risk Assessment Model Weightings 2011-2012
GV_2.1_R_ORM Risk Model
GV_2.2_Response to NEB IR No 1
GV_2.3_D_Field Operations Department Plan
GV_2.3_Documents and Records Summary
GV_2.4_D_10.2 HR_WFP Procedure Manual_V01
GV_2.4_D_10.3 HR_WFP Quick Reference Guide_V01
GV_2.4_D_10.4 HR_WFP FAQ_V01
GV_2.4_R_Position_Description Template_V01
GV_2.4_R_10.13 HR_Job Ladders for Govt and Public Affairs_V01
GV_3_6_Documents and Records Summary
GV_3.3_D_B1_06-02-01
GV_3.3_D_FORM-B0-D-001_DEVIATION REQUEST FORM
GV_3.3_D_IMS 01 Governing Policies and Processes
GV_3.3_Documents and Records Summary
GV_3.4_D_Appendix 1 - Training Matrices
GV_3.4_D_Appendix 2 - TRAC Syllabus 2013
GV_3.4_D_Appendix 3 - Health and Safety Forms
GV_3.4_D_Current State Report 051214
GV_3.4_D_HR 1Content Development - Content Build (Mar 30)_V01
GV_3.4_D_HR 20120914 ALD Governance Structure_V01
GV_3.4_D_HR Administrator - Resources_V01
GV_3.4_D_HR eLMS Client Orientation_2013_V01
GV_3.4_D_HR eLMS Roles and Responsibilities_V01
GV_3.4_D_HR ENBU Guiding Principles_V01
GV_3.4_D_HR End User - Job Aids List_V01
GV_3.4_D_HR IDP FAQ 2014 2_V01
GV_3.4_D_HR IDP Instructions 2_V01
GV_3.4_D_HR Individual Contributor Competencies GT_V01

\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

GV_3.4_D_HR LD Competency Framework Process_V01
GV_3.4_D_HR LDRSHIP Dev Framework 3_V01
GV_3.4_D_HR Manager - Job Aids List_V01
GV_3.4_D_HR What Makes an Individual Development Plan IDP Rev 2_V01
GV_3.4_D_OPS Competency Matrix V01
GV_3.4_D_OPS Matrix Verification Report V01
GV_3.4_D_OPS Tech Training Mgmnt System V01
GV_3.4_R_Record - Forecast Report
GV_3.4_R_Record - Metrics
GV_3.4_R_Record - Operations Competency
GV_3.4_R_Record - PLM Test - Matrix verification
GV_3.4_R_Record - PLM Test - Student all Report
GV_3.4_R_Record - Supervisor Report
GV_3.4_R_Record - TRAC - Quick Ref Card
GV_3.4_R_Record - TRAC Screen
GV_3.4_R_Record - Training Completion
GV_3.5_D_IMS 04 Occupational Health and Safety Management System
GV_3.5_D_IMS 06 Environmental Management System
GV_3.5_D_IMS 07 Emergency and Security Management System
GV_3.5_R_Operational Reliability Review Nov 26
GV_3.6_D_Documents Policy
GV_3.6_D_Governance Documents Library How To
GV_3.6_D_IMS 02 Compliance and Ethics_V01
GV_3.6_D_OMS_Operating-Maintenance Procedures Management Standard Document_V01
GV_3.6_D_Procedure Library Processes
GV_3.6_R_Governance Documents Library Communication
GV_3.6_R_Governance Documents Library FAQs
GV_3.6_R_Procedure Library Communication
GV_4 2_D_B1_02-02-01_rev12
GV_4 3_Documents and Records Summary
GV_4.1_Documents and Records Summary
GV_4.2_D_B1_02-02-03
GV_4.2_D_EnCompass - IMS Participant Manual (Enterprise)
GV_4.2_D_LRS User Manual
GV_4.2_Documents and Records Summary
GV_4.3_Response to NEB IR No 1
IN 3.1 R NDE Report Summary
Individual Development Plan - PLM Employee
IN-DP 3 1 Documents and Records Summary
IN-DP 3 1 Documents and Records Summary
IN-DP 3 1 Response to NEB IR No 1
IN-DP 3 1 Response to NEB IR No 1

\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

IN-DP_3.1_D_Advanced_Line_Locator_Field_Manual_-_Enbridge_FINAL_DRAFT_v3_TL_2-22-12
IN-DP_3.1_D_Canadian- One Call Procedures 2013_V01
IN-DP_3.1_D_Damage Prevention Assessment Procedure_V01
IN-DP_3.1_D_Data Mining Guidelines 2014_V01
IN-DP_3.1_D_DP Assessment Excavation Sites 2013
IN-DP_3.1_D_DP Assessment One Call Response 2013
IN-DP_3.1_D_DP Assessment TALL Competency 2013
IN-DP_3.1_D_Enbridge Baron B58 Operations Manual - Original Final
IN-DP_3.1_D_Excavation_Site_Assessment_2014
IN-DP_3.1_D_LTU Unauthorized Crossing Process and Filing (23.07.12)_V01
IN-DP_3.1_D_OMM B3_03-01-01_Overview of ROW Maintenance_V01
IN-DP_3.1_D_OMM B3_03-02-01_Right-Of-Way Monitoring_V01
IN-DP_3.1_D_OMM B3_03-02-02_Right-of-Way Signs-Markers_V01
IN-DP_3.1_D_OMM B3_03-02-06_Depth of Cover Monitoring_V01
IN-DP_3.1_D_OMM B3_04-02-02_Damage Prevention_V01
IN-DP_3.1_D_One-Call_Response_Assessment_2014
IN-DP_3.1_D_Pipeline Depth Monitoring Program LP (July 2013)_V01
IN-DP_3.1_D_Safety Zone Excavation Request Form (April 2014)_V01
IN-DP_3.1_D_TALL Evaluation Form 2013-05-31_V01
IN-DP_3.1_D_TALL Training Classroom Presentation
IN-DP_3.1_D_TALL Training Course_Syllabi_for_Minnie_(12 11)
IN-DP_3.1_D_TALL Training in-person Curriculum
IN-DP_3.1_D_TALL_Minnie_2011_(12 11)
IN-DP_3.1_D_Tracking Storage Process_V01
IN-DP_3.1_D_Unauthorized Crossing Information Report_V01
IN-DP_3.1_R_10-2-1 Brochure(2012)_V01
IN-DP_3.1_R_DP Assessment One Call Response Tracking (2013)_V01
IN-DP_3.1_R_DP Assessment TALL Response Tracking (2013)_V01
IN-DP_3.1_R_Example Log Sheets Aerial Patrol May 2014
IN-DP_3.1_R_Final NEB Pipeline Protection measures 2012 signed by Mgt_V01
IN-DP_3.1_R_IMS Damage Prevention Function Model_V01
IN-DP_3.1_R_Line Locate Brochure (2013)_V01
IN-DP_3.1_R_Meeting 1 Minutes- October 11, 2012_V01
IN-DP_3.1_R_TALL Participants list_V01
IR May 12 - CR_3.1_R_Agricultural Screening Tool_V01
IR May 12 - Staff Survey - Central Region PAP Annual Assessment 2011
IR May 12 - Staff Survey - Eastern Region Annual Assessment 2011_Redacted
IR May 12 - Staff Survey - EPNWI Annual Assessment 2011
IR May 12 - Staff Survey - Western Region Annual Assessment 2011
IR May 12 - Survey Analysis - PAC Q1 2013 Minutes
IR May 12 - Survey Analysis - PAC Q1 2014 Minutes
IR May 12 - Survey Analysis - PAC Q2 2013 Minutes

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IR May 12 - Survey Analysis - PAC Q3 2013 Minutes
IR May 12 - Survey Analysis - PAC Q4 2013 Minutes
IR May 12 - Trending - Analysis of Survey Cards from EPI Newsletter of Fall 2013
IR May 12 - Trending - Landowner Newsletter EPI Fall 2013 Response Survey
IR May 7 - Analysis - Crossings Monthly Meeting - Minutes - Dec 17, 2014_Redacted
IR May 7 - Analysis - Crossings Monthly Meeting - Minutes - Jan 27 2014_Redacted
IR May 7 - Analysis - Crossings Monthly Meeting - Minutes - Mar 19, 2014_Redacted
IR May 7 - Analysis - Crossings Monthly Meeting - Minutes - May 1, 2014_Redacted
IR May 7 - Health Check - 2011 Communica External Assessment of EPNWI
IR May 7 - Trending - Analysis of Survey Cards from EPI KIT 2005-2007-2011
IR May 7 - Trending - Analysis of Survey Cards from EPI KIT 2011
IR May 7 - Trending - Analysis of Survey Cards from EPI Newsletter of April 30 2012 rev 1
IR May 7 - Trending - Annual Third Party Applications Tracking
IR May 7 - Trending - Comparison 2005, 2007 and 2011 EPI Survey Cards
IR May 7 - Trending - Landowner Newsletter EPI 2012 Response Survey - APRIL 30, 2012
IR May 9 - Agenda - Crossings Monthly Meeting - Agenda - Dec 17, 2014
IR May 9 - Agenda - Crossings Monthly Meeting - Agenda - Jan 27 2014
IR May 9 - Agenda - Crossings Monthly Meeting - Agenda - Mar 19, 2014
IR May 9 - Agenda - Crossings Monthly Meeting - Agenda - May 1, 2014
IR May 9 (LS) - Job Description - Employee - ROW Manager
IR May 9 (LS) - Scorecard - 2014 Land Services - OPS Scorecard - Revised April 19, 2014
IR May 9 (LS) - Scorecard - GV_1.2_D_LP Scorecard 2013 Nov 13_Redacted
IR May 9 (LS) - Training - Employee Sample Training Transcript (2013-2014)
IR May 9 (LS) - Workforce Plan - Land Services (CDN Ops) - Memo - Reorganization and Staffing
IR May 9 (LS) - Workforce Plan - Proposed Lands Operations 2013 Org Chart (Aspirational)
Job Profile - Contractor - Crossing Coordinator
Job Profile - Team Lead Crossings
Land Services Managers Meeting Agenda – Q1 2014
Land Services Managers Meeting Agenda – Q2 2014
Land Services Meeting Agenda – April 24 2014
Land Services Meeting Agenda – May 29 2014
Letter to NEB Auditors re Treatment of Documentation - Mar 25 2014
Line Summary Maps - 2013
Log Sheets
Major Outage Coordination Upstream Downstream Lines
Major Outage Coordination Downstream Lines(April 09 2014) NEB-regulated1
Major Outage Coordination Upstream Lines (April 09, 2014) NEB-regulated1
Mentee List- Central
Mentee List-Eastern Region
Mentee List-Enbridge Sask
Mentee List-Northern Region
NEB Org chart CR all v2

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NEB Org chart EPSI all v2
NEB Org chart.ER.all
NEB Org chart.NR.all
NEB Org chart.WR.all
NEB Regulated Pressure Vessels - Shipped Product Only
NEB tanks 2014 and OOS inspections planned Rev1
NGL_Class_Locations_2013
OMM Annual Review Form
OMM Annual Review Form – October 2013
OMM Book 3 04-02-02
PA 09 PAP contract_Redacted
PA 3.4 Documents and Records Metadata Table
PA 3.4 Response to NEB IR No. 1
PA 4.1 Documents and Records Metadata Table
PA 4.1 Response to NEB IR No. 1
PA_2.3_2014 - Land Services Dept Plan - Final_V1
PA_3.1_D_OMS_Operating-Maintenance Procedures Management System Document_V01
PA_3.1_Documents and Records Summary
PA_3.1_R_2014 Ag Tool_V01
PA_3.1_R_2014 Central Region ER Cover Letter_V01
PA_3.1_R_EPI 2013 Fall Newsletter_V01
PA_3.1_R_EPI 2013 Fall Survey_V01
PA_3.1_R_EPI 2013 Spring Newsletter_V01
PA_3.1_R_EPI 2013 Spring Postcard_V01
PA_3.1_R_EPI 2014 Central Region KIT Cover Letter_V01
PA_3.1_R_EPI 2014 Keeping in Touch Full Brochure_V01
PA_3.1_R_EPI 2014 Keeping in Touch Mini Brochure_V01
PA_3.1_R_EPI 2014 Western Region Magnet_V01
PA_3.1_R_EPI ER Brochure_V01
PA_3.1_R_EPI Excavator Brochure DRAFT_V01
PA_3.1_R_EPI Fall 2013 Kids Page_V01
PA_3.1_R_Landowner Survey Card_V01
PA_3.1_R_OMM Book 1 03-02-02_V01
PA_3.1_R_PAC Q4 2013 Meeting Minutes_V01
PA_3.1_R_PAP Assessment Survey Blank_V01
PA_3.1_R_Safety Colouring Book_V01
PA_3.1_R_Western Region Hospital Fact Sheet_V01
PA_3.1_Response to NEB IR No 1
PA_3.4_R_2013 Land Agent Orientation_V01
PA_3.4_R_2014 Ag Tool_V01
PA_3.4_R_911 Dispatch Module Final Script_V01
PA_3.4_R_Enbridge Excavator Binder_V01

\* Document titles are shown as presented in the electronic portal from Enbridge Pipelines Inc.

PA_3.4_R_EREP Brochure_V01
PA_3.4_R_LOIDUserManual_V01
PA_3.4_R_PAPTraining_V01
PA_4.1_R_EPI 2011 Communica External Review_V01
PA_4.1_R_EPI 2013 Fall Survey_V01
PA_4.1_R_Land Services Capability Roadmap_V01
PA_4.1_R_Landowner Survey Card_V01
PA_4.1_R_PAP Assessment Survey Blank_V01
PA_CR 2.2 R Sample Legal Update Excerpt
PA_CR_2.2_R_Sample Communication of Legal Requirements
PAP Assessment Survey Blank
PA-WB 3 1 Documents and Records Summary
PA-WB 3 1 Response to NEB IR No 1
PA-WB_3.1_D_Admin Procedures for PAP_V1
PA-WB_3.1_D_Gathering OMP 13 2_V1
PA-WB_3.1_D_PAP Assessment Survey_V1
PA-WB_3.1_R_Effectiveness Review_V1
PA-WB_3.1_R_Emergency Responder Awareness Presentations_V1
PA-WB_3.1_R_Emergency Response Contact Lists RM_V1
PA-WB_3.1_R_Excavator Contact List_V1
PA-WB_3.1_R_Hospital Sheet_V1
PA-WB_3.1_R_Landowner Survey Card_V1
PA-WB_3.1_R_Letter from Director_V1
PA-WB_3.1_R_Letter from Region MB_V1
PA-WB_3.1_R_Letter from Region_V1
PA-WB_3.1_R_Stakeholder Contact Sheets for First Response and Municipal Organizations_V1
PA-WB_3.1_R_Stakeholder Contact Sheets_V1
Pipeline Services Management Meeting - May 21 2013
Pipeline Services Management Meeting (May 29 2014) - Actions
Pipeline Services Supervisor Meeting Minutes Dec 9 2014
PLM employee training profile
PLM Training Matrix
PLM Work Practice Inspection 1
PLM Work Practice Inspection 2
PLM Work Practice Inspection 4
Public Awareness - March 24, 2014
RE_Central Region Land Agents_Redacted
Regina PLM foreign crossings and locates performed 2012topresent statistics_Redacted
regional mocs - pipeline services
Registry_Inventory
Risk Register - Land Services v1.0 - Audit Copy 2
RP_System Capacity_Rev1

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Safety Zone Permission 1_Redacted
Safety Zone Permission 2_Redacted
Scope of Work - Pipeline Services
Scope of Work - Pipeline Services
Senior Land Agent Job Description
Senior Public Awareness Advisor job description
Senior_Pilot
Sr Lands and ROW Specialist - Land Services -Cdn Projects
Student Training All Christopher Dobson
Supervisor Pipeline Services
TALL - Transmission Advanced Line Locating
TRAC Syllabi V01
Training transcript – job training matrix for Land Services and PA
Working_Group_Contact_List

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