

10.0 Environmental protection, follow-up and monitoring

10.1 Introduction

Manitoba Hydro will implement the mitigation measures, monitoring and other follow-up actions identified in chapter 8 through an Environmental Protection Program (EPP). The EPP provides the framework for implementing, managing, monitoring and evaluating environmental protection measures consistent with regulatory requirements, corporate commitments, beneficial practices and public expectations. Environmental protection, management and monitoring plans will be prepared and implemented under the EPP to address environmental protection requirements in a responsible manner.

The purpose of this chapter is to outline how Manitoba Hydro will implement, manage and report on environmental protection measures, monitoring and other follow-up actions as well as regulatory requirements and other commitments identified in this environmental assessment report.

Manitoba Hydro developed the environmental protection program in accordance with its vision and environmental policies.

The Corporate Vision is:

“To be recognized as a leading utility in North America with respect to safety, reliability, rates, customer satisfaction and environmental leadership”.

Manitoba Hydro’s Corporate Environmental Management Policy (Manitoba Hydro 2017g) states that:

Manitoba Hydro is committed to protecting the environment by:

- Preventing or minimizing any adverse impacts on the environment, and enhancing positive impacts;
- Continually improving our Environmental Management System;
- Meeting compliance obligations;
- Considering the interests and recognizing the knowledge of our interested parties who may be affected by our actions;
- Reviewing our environmental objectives and targets regularly to ensure improvement in our environmental performance; and
- Documenting and reporting our activities and environmental performance.

10.1.1 Environmental management

Manitoba Hydro is certified under the International Organization for Standardization (ISO) 14001 Environmental Management System standard and is subject to requirements of the standard, including annual audits to verify its environmental performance. An Environmental Management System is a framework for developing and applying its environmental policy and includes articulation of organizational structure, responsibilities, practices, processes and resources at all levels of the corporation. The Environmental Management System includes commitments to comply with legislation, licenses, permits and guidelines, conduct inspections and monitoring, and review the results for adherence to requirements. The ISO standard ensures quality, performance and continual improvement in the delivery of Manitoba Hydro's Environmental Protection Program.

10.1.2 Adaptive management

Adaptive management is a planned systematic process employed with the goal of continually improving environmental management practices by learning from their outcomes. The Environmental Protection Program for the Project has established the principles of adaptive management allowing for flexibility in the mitigation of adverse environmental effects that may result from the Project. Manitoba Hydro will use the information gathered during follow up and monitoring activities to verify the accuracy of the environmental assessment effects predictions and the effectiveness of implemented mitigation measures.

Manitoba Hydro designed the EPP to be adaptive and responsive throughout the Project lifecycle by evaluating program documents, processes, procedures and mitigation measures through inspection, monitoring and communication programs and conducting reviews to facilitate updates to the program.

Within the Environmental Protection Program, adaptive management will take place in two primary areas:

- At the management level, involving changes with the program structure itself; and
- At the implementation level, involving individual mitigation measures as management and implementation teams evaluate the onsite effectiveness of mitigation strategies or the program as a whole.

Scheduled update meetings between departments, annual reviews of the program and its effectiveness will take place to foster the process.

10.1.3 Experience from previous projects

Manitoba Hydro has extensive experience in the development of environment protection, monitoring and follow-up plans for all sizes of projects in many different environments, from small electrical stations, to transmission lines that span over half of Manitoba.

The development of the EPP has allowed the standardization and consistent approach to environmental protection, monitoring and follow-up. The EPP improves through the experiences from past and current projects (e.g., monitoring and inspection results, documentation format changes).

10.1.4 Indigenous self-directed studies

As a component of the Indigenous engagement Process (IEP), Manitoba Hydro offered Indigenous communities and organizations the opportunity to conduct self-directed studies by funding for these studies. Manitoba Hydro offered the studies to help inform the environmental assessment, and to develop a better environmental assessment report and Environmental Protection Program.

The knowledge that was shared through the studies assisted Manitoba Hydro with:

- Developing a greater understanding of the Project Footprint Area;
- Identifying key concerns in the Project Footprint Area;
- Identifying potential Project effects;
- Planning and designing the Project; and
- Developing potential mitigation measures.

The Manitoba Metis Federation's Birtle Transmission Project Metis Land Use and Occupancy Study – Baseline Information provided knowledge and identified concerns for incorporation into the EPP. Manitoba Hydro also anticipates that the reports from Gambler First Nation and Waywayseecappo First Nation will help inform the EPP.

Manitoba Hydro recognizes the unique relationship that Indigenous communities and organizations have with their areas of use, and appreciates sharing of information about their history and culture, and perspective on the Project.

10.2 Environmental protection program

10.2.1 Overview

Manitoba Hydro's Environmental Protection Program (EPP) provides the framework for the delivery, management and monitoring of environmental and socio-economic protection measures that satisfy corporate policies and commitments, regulatory requirements, environmental protection guidelines and beneficial practices, and input during the Public Engagement Process (PEP) and Indigenous engagement process (IEP). The EPP:

- Describes how Manitoba Hydro is organized;
- Functions to deliver timely, effective, comprehensive solutions and mitigation measures to address potential environmental effects;
- Defines roles and responsibilities for Manitoba Hydro employees and contractors; and
- Outlines management, communication and reporting structures.

The EPP includes the what, where and how aspects of protecting the environment during the pre-construction, construction, operation and decommissioning of the Project. Figure 10-1 illustrates the components of the EPP. The following sections describe each component in further detail.

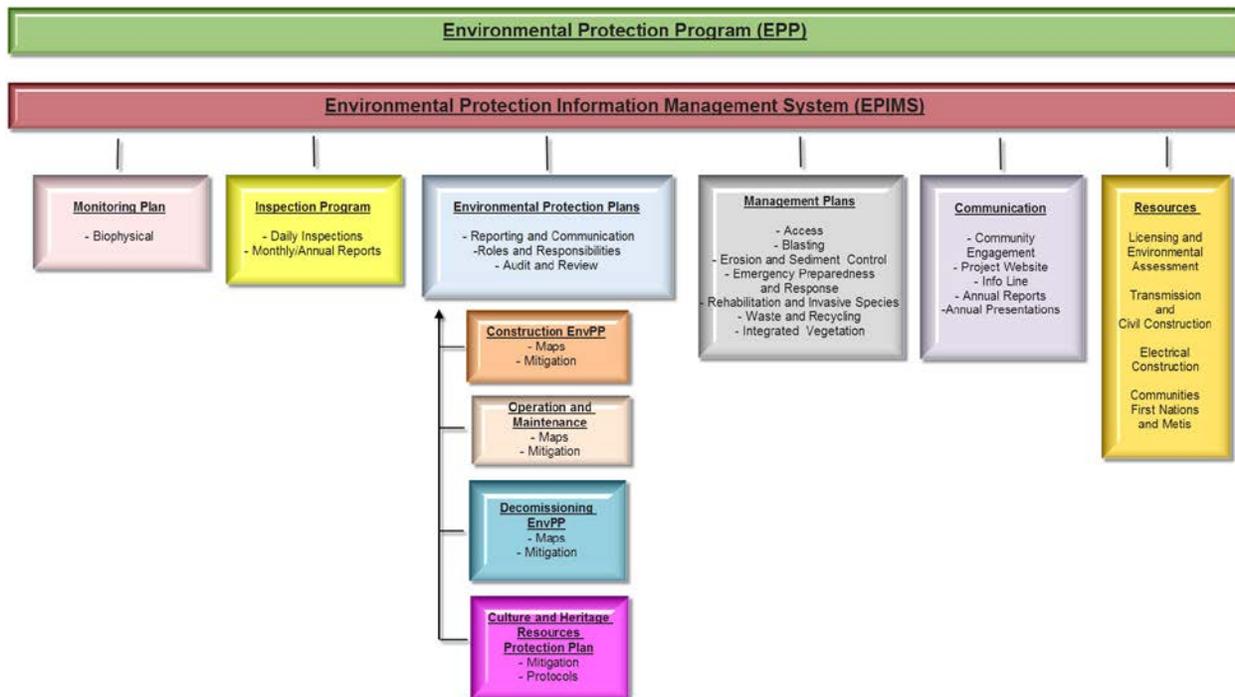


Figure 10-1: Environmental protection program components

10.2.2 Organization

The organizational structure of the EPP includes senior Manitoba Hydro management, Project management and implementation teams that work together to provide timely and effective implementation of environmental protection measures identified in environmental protection plans (Figure 10-2). Manitoba Hydro senior management is responsible for the overall EPP, including resourcing, management and performance, and is accountable for regulatory compliance, policy adherence and stakeholder satisfaction.

The environmental protection management team is composed of senior Manitoba Hydro staff and is responsible for the management of environmental protection plans, including compliance with regulatory and other requirements, quality assurance and control, consultation with regulators, and related PEP and IEP activities. Environmental consultants and advisors support the management team.

The environmental protection implementation team is composed of Manitoba Hydro operational field and office staff, and is responsible for the day-to-day implementation of

environmental protection plans, including monitoring, inspecting and reporting. The implementation team works closely with other Manitoba Hydro staff as required.

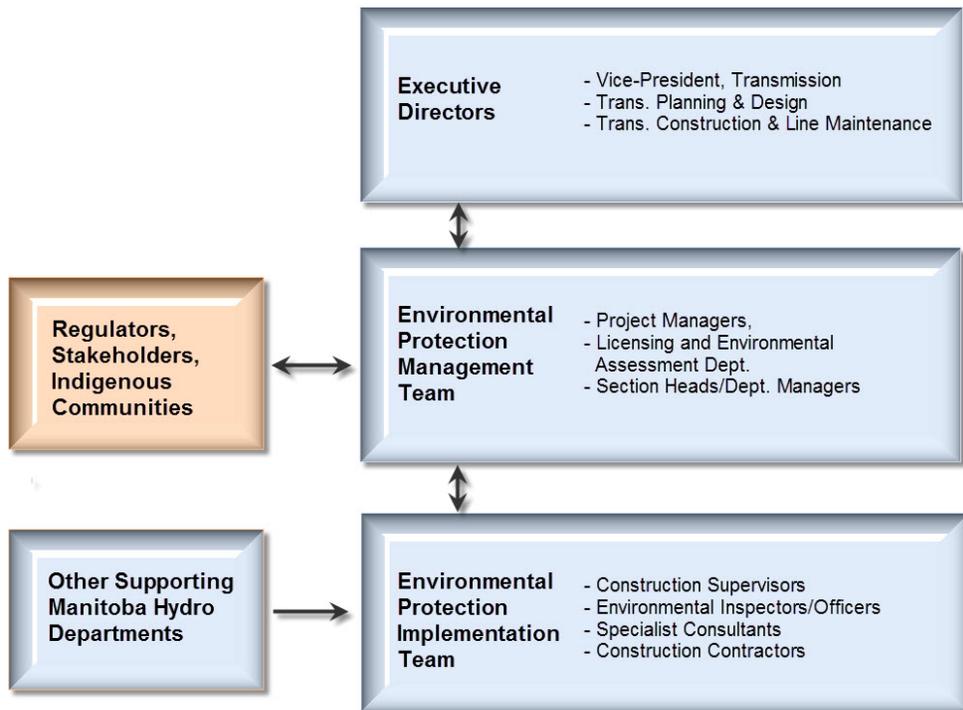


Figure 10-2: Environmental protection organizational structure

10.2.3 Resources

Manitoba Hydro commits resources early in the planning cycle to provide effective environmental assessment, mitigation and monitoring. Teams of engineers and environmental professionals develop preventative or avoidance mitigation measures that include design and routing alternatives. In addition, there are resource allocations for the delivery and implementation of specific environmental protection measures to meet corporate policy and government regulatory requirements.

Manitoba Hydro is committed to staffing the Environmental Protection Program with sufficient environmental inspectors and providing required support, including training, financial resources and equipment.

10.2.3.1 Roles and responsibilities

Figure 10-3 illustrates the typical organizational lines of reporting and communications. The roles and responsibilities for delivery of the Project and implementation of environmental protection measures are as follows:

- The Construction Supervisor has overall responsibility for the implementation of the environmental protection plans and reports to a Section Head or Department Manager;
- The Licensing and Environmental Assessment Department oversees the development of environmental protection documents and associated inspection and monitoring programs, including ongoing PEP and IEP activities;
- The construction contractor is responsible for ensuring work adheres to the environmental protection plans and reports to the Construction Supervisor;
- Environmental Inspectors / Officers have the primary responsibility to confirm that environmental protection measures and specifications are implemented as per the environmental protection plans as well as provide information and advice to the Construction Supervisor; and
- Manitoba Hydro Field Safety, Health and Emergency Response Officers are responsible for the development and execution of the safety program and Occupational Health and Safety practices at the various construction sites.

Other Manitoba Hydro employees, including engineers and technicians, provide information and advice to the Construction Supervisor.

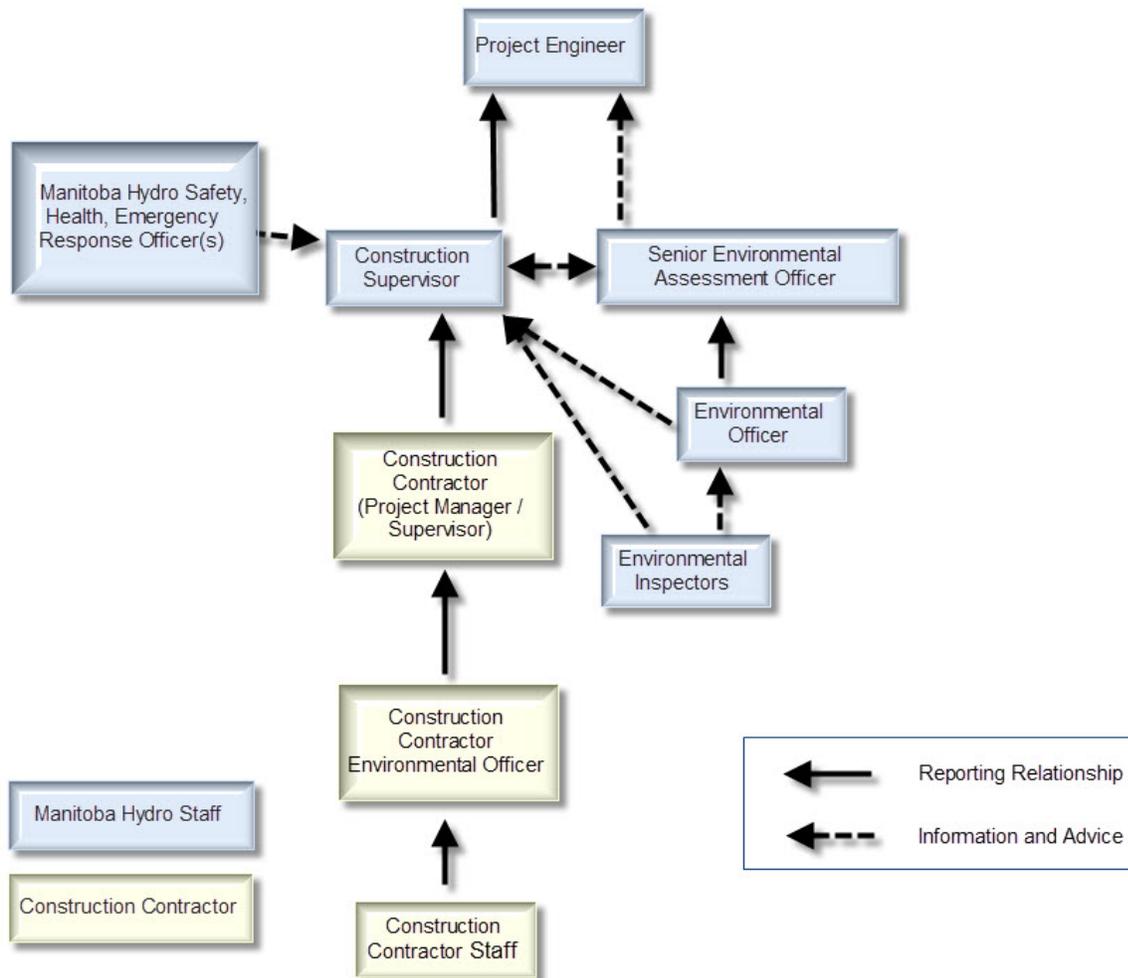


Figure 10-3: Typical organizational lines of reporting and communications

10.2.4 Communication and reporting

Manitoba Hydro personnel will maintain ongoing communications with Manitoba Sustainable Development, other provincial and federal departments, and Indigenous communities and organizations regarding implementation of the Project environmental protection plan. The Construction Supervisor and Environmental Inspectors will maintain ongoing communications with the contractor and contract staff through daily tailboard meetings and weekly or otherwise scheduled construction meetings at the worksite. Inspection reports as well as incident, monitoring and other reports will be prepared and available on site for the regulators, contractors and Manitoba Hydro staff.

Manitoba Hydro will provide Indigenous communities and organization and the public with ongoing opportunities to review and comment on the Project. Manitoba Hydro

developed a dedicated Project website to facilitate communication with the public, Indigenous communities and organizations, landowners and stakeholders. The Environmental Protection Management Team will record and review formal enquiries or complaints for response or action.

10.2.5 Environmental protection plans

Environmental protection plans document environmental protection measures to provide for compliance with regulatory and other requirements, and to achieve environmental protection goals consistent with corporate environmental policies. Manitoba Hydro designed the environmental protection plans as “user-friendly” reference documents that provide Project managers, construction supervisors and contractors with detailed lists of environmental protection measures and other requirements implemented in the design, construction and operation phases of a project.

Manitoba Hydro organized the environmental protection measures by construction component and activity, and environmental component and issue to assist Project personnel in implementing measures for specific work sites and activities.

Manitoba Hydro will develop the environmental protection plans described in the following sections.

10.2.5.1 Construction

The construction environmental protection plan (CEnvPP) is a key element in implementing effective environmental protection and limiting the potential adverse environmental effects identified in the environmental assessment report. It also outlines actions to identify unforeseen environmental effects and implement adaptive management strategies to address them. An important component of an environmental protection plan is review and updating. This allows environmental protection measures to remain current, continually improving environmental performance.

A CEnvPP is composed of general and specific environmental protection measures that cover all aspects of the work and the environment. General environmental protection measures for the Project include mitigation measures and follow-up actions identified in the EA Report, including design mitigation, provincial and federal regulatory requirements, beneficial practice guidelines, Manitoba Hydro environmental policies and commitments, and input during the PEP and IEP.

The CEnvPP lists the general environmental protection measures for major components and activities associated with the Project. Specific environmental protection measures are provided for environmentally sensitive sites (ESS) identified during PEP, IEP and

assessment activities. Environmentally sensitive sites are locations, features, areas, activities or facilities along or immediately adjacent to the transmission line corridor and other Project components that are ecologically, socially, economically or culturally important and sensitive to disturbance by the Project and, as a result, require site-specific mitigation measures.

The CEnvPP will contain orthophoto map sheets that provide Manitoba Hydro Project managers, construction supervisors and employees, and contractors and contract employees with detailed site-specific environmental protection information that can be implemented, managed, evaluated and reported on in the field.

The CEnvPP (Appendix G) has been provided as draft to allow for review and input through the IEP and regulatory process; finalization, including incorporation of IEP feedback and ESS, will occur subsequent to licensing and prior to construction.

10.2.5.2 Operation and maintenance

The Operations and Maintenance Environmental Protection Plan will be prepared prior to completion of construction. It will contain an access management plan and ongoing operation monitoring requirements. It will apply to Project components from in-service to the end of operational life.

10.2.5.3 Decommissioning

A decommissioning environmental protection plan will be prepared at the end of the Project's operational life and will contain decommissioning methods, waste and recycling management, and mitigation measures to address environmental effects and legislation that is in effect at that time.

10.2.5.4 Cultural and heritage resources

The fact that cultural and heritage resources have intrinsic value to Manitobans is understood by Manitoba Hydro and addressed through a separate protection plan. The culture and heritage resource protection plan, (Appendix H), outlines protection measures in the event of the discovery of previously unrecorded cultural and heritage resources during construction and describes the ongoing monitoring of known cultural and heritage resources for disturbance.

Through the IEP including the self-directed studies and previous projects Manitoba Hydro understands and acknowledges the importance of cultural and heritage resources to First Nations and Metis. Manitoba Hydro has developed mechanisms such

as notification of discovery, involvement in site investigations and sharing of reports, which are further explained in the culture and heritage resource protection plan.

Results from the heritage resources monitoring program will be discussed through the IEP on an as required basis during construction, as well as annually through a Heritage Resources Impact Assessment to the Manitoba Historic Resources Branch as per the terms of the *Heritage Resources Act (1986)* and Heritage Permit.

10.2.6 Management plans

Management involves the organization of activities and resources to resolve or respond to environmental problems, issues or concerns. Management plans provide reasoned courses of action to achieve pre-defined goals or objectives. Management plans will be prepared to address important management issues, regulatory requirements and corporate commitments identified in the environmental assessment report. The management plans will describe the management actions, roles and responsibilities, evaluation mechanisms, updating requirements and reporting schedules. The following management plans will be prepared prior to the start of construction of the Project:

- Access management;
- Biosecurity;
- Blasting;
- Erosion protection and sediment control;
- Emergency preparedness and response;
- Rehabilitation and weed management;
- Waste and recycling; and
- Integrated vegetation management.

Environmental inspectors/officers will conduct regular inspections during construction to ensure adherence to the plans. The following sections describe each plan.

10.2.6.1 Access management plan

Prior to the start of construction, Manitoba Hydro will prepare an access management plan to minimize the need to construct new access roads and trails.

The access management plan will outline:

- The use of existing roads and trails to the extent possible during construction;

- Management objectives and principles;
- Contact requirements for municipalities, landowners, resource users and other parties consulted prior to accessing lands;
- Security requirements, including:
 - terms and conditions for access,
 - restrictions on firearms,
 - hunting and fishing, and
 - other resource use activities.
- Environmental protection measures including:
 - timing windows,
 - vehicle cleaning and servicing,
 - gate protocols,
 - load restrictions,
 - warning signage,
 - speed limits,
 - sensitive area avoidance,
 - stream crossings and
 - other environmental issues.
- Access management issues and mitigation strategies;
- Safety of construction workers and the general public;
- Respect for First Nation and Metis rights and resource users; and
- Protection of natural, cultural and heritage resources.

10.2.6.2 Biosecurity

Prior to the start of construction Manitoba Hydro will prepare a biosecurity management plan for the Project to provide guidance to Manitoba Hydro staff and contractors in order to prevent the introduction and spread of weeds and other pests, including invasive species, in agricultural land and livestock operations through Project pre-construction and construction activities.

10.2.6.3 Blasting

Prior to the use of explosives, the contractor will prepare blasting plans to manage the storage and use of explosives at construction sites in accordance with environmental protection measures, provincial and federal legislation and guidelines, and corporate policies for explosives.

10.2.6.4 Emergency preparedness and response

Prior to the start of construction, each contractor will prepare an emergency preparedness and response plan to prepare for and respond to emergencies at construction sites in accordance with provincial legislation and guidelines, and corporate policies and procedures for the protection of human health and the environment. The plan will include the following:

- Spills or releases of hazardous substances, including petroleum products;
- Accidents involving hazardous substances;
- Medical emergencies;
- Explosions and fire; and
- Measures prescribed for:
 - provision of emergency response planning,
 - responsibilities,
 - training,
 - exercises,
 - procedures,
 - containment, and
 - clean-up equipment and materials.

10.2.6.5 Erosion protection and sediment control

Prior to the start of construction, Manitoba Hydro will develop an erosion protection and sediment control framework to guide each contractor in preparing an erosion protection and sediment control to limit adverse environmental effects of sediment releases on the aquatic environment in accordance with provincial and federal legislation and guidelines, and corporate environment policies and guidelines.

The plan will prescribe environmental protection measures including:

- Frozen ground conditions;
- Establishment of buffer zones;
- Avoidance of sensitive areas; and
- Use of bioengineering techniques.

10.2.6.6 Rehabilitation and weed management

Prior to the start of construction, Manitoba Hydro will prepare a rehabilitation and weed management plan in accordance with environmental protection measures and provincial guidelines for rehabilitation.

The plan will prescribe measures for:

- Washing equipment and vehicles prior to entering construction sites;
- Controlling vegetation at construction sites; and
- Restoring and re-vegetating disturbed sites.

10.2.6.7 Waste and recycling

Prior to the start of construction, Manitoba Hydro or the Contractor will develop a waste and recycling management plan to manage wastes at work and camp locations in accordance with provincial legislation and guidelines, and corporate policies and procedures for the protection of human health and the environment.

The plan will include measures for:

- Waste reduction;
- Recycling and reusing initiatives;
- Storage of kitchen wastes;
- Recycling and disposal of construction wastes; and
- Disposal of wastes at licenced facilities.

10.2.6.8 Integrated vegetation management

Prior to the implementation of vegetation management measures, Manitoba Hydro will prepare an integrated vegetation management plan to manage the vegetation on the rights-of-way (ROWs) during Project operation and maintenance using a variety of industry standard techniques and providing guidance for the development integrated control measures to manage target vegetation on and off the ROWs.

The plan will include:

- A description of vegetation control methods;
- Criteria for the application of control methods;
- Communication protocols to the public, First Nations and Metis;

- Environmental protection measures for the use and handling of pesticides, including storage and disposal at licenced facilities; and
- Requirements for regular patrols of the ROW to monitor vegetation growth and management effectiveness.

10.3 Follow-up and monitoring

Follow-up and monitoring is conducted to verify the accuracy of the environmental assessment of a project, assess the effectiveness of measures taken to mitigate adverse effects and determine compliance with regulatory requirements. Manitoba Hydro implements the follow-up and monitoring activity using two programs called Inspection and Monitoring, which are discussed further in the sections below.

10.3.1 Indigenous engagement process

Manitoba Hydro will offer Indigenous communities and organizations that completed self-directed studies Environmental Protection Program (EPP) meetings to review and discuss the findings from the self-directed studies and how the information shared will inform the EPP for the Project. Manitoba Hydro will also offer EPP meetings to communities and organizations that did not develop self-directed studies.

Manitoba Hydro proposes establishing a heritage and culture review (HCR) team that would include the Project Archaeologist and a community representative. The HCR team would conduct a pre-construction survey of the final preferred route at locations with high potential for the discovery of cultural and heritage resources.

10.3.2 Inspection program

Inspection is the organized examination or evaluation involving observations, measurements and sometimes tests for a construction project or activity. The results of an inspection are compared to specified requirements, drawings and standards for determining whether the item or activity is in conformance with these requirements. Environmental inspection is an essential and key function in environmental protection and implementation of mitigation measures.

Manitoba Hydro has established a comprehensive integrated environmental inspection program to comply with regulatory approvals and meet corporate environmental objectives. The program includes environmental inspectors to be onsite during construction activities. Manitoba Hydro's approach to environmental inspection includes:

- Compliance with regulatory approvals;

- Adherence to environmental protection plans;
- Onsite environmental inspectors;
- Training and education;
- Regular monitoring and inspection during construction;
- Interaction with contractors (e.g., pre-construction meeting, daily discussion);
- Regular review of inspection and monitoring information;
- Quick response to incidents or changing conditions;
- Monthly summary reports;
- Regular reporting to regulators; and
- Notification of regulators of emergency or contingency situations.

Environmental inspectors/officers will:

- Visit active work sites to inspect for compliance with licence, permit or other approval terms and conditions, and adherence to environmental protection plan general and specific mitigation measures;
- Report all instances of non-compliance to the construction supervisor, contractor and applicable regulatory authority (i.e., Manitoba Sustainable Development);
- Report incidents such as accidents, malfunctions, spills, fires, explosions and environmental damage to the construction supervisor and applicable regulatory authority;
- Record all inspection activities in a daily journal and complete daily inspection forms; and
- Provide daily and monthly inspection reports electronically to the environmental protection information management system for review and viewing by applicable Project staff.

Incidents will be dealt with immediately and followed up in subsequent daily inspection reports.

10.3.3 Monitoring program

A draft environmental monitoring plan is included in Appendix I. It describes parameters to be monitored, methods to be used, roles and responsibilities, and reporting schedules. Monitoring will be carried out by Manitoba Hydro and may be contracted to environmental consultants that possess the necessary expertise, equipment and

analytical facilities. Reports from monitoring programs will be submitted annually to regulatory authorities, shared with interested Indigenous communities and organizations and placed on the Project website.

Monitoring will be carried out on selected environmental components using environmental indicators and measurable parameters identified in the EA Report. Components to be monitored will be selected based on regulatory requirements, environmental importance, vulnerability and sensitivity, and licence requirements. The monitoring plan describes sampling procedures, methods and protocols, and reporting requirements. Results from monitoring will be used through an adaptive management process to adjust mitigation measures and to modify the plan on an ongoing basis. The monitoring reports will be provided annually to Manitoba Sustainable Development, shared with interested Indigenous communities and organizations and placed on the website established for the Project.

10.3.4 Environmental Protection Information Management System

An environmental protection information management system (EPIMS) is the internal central repository of environmental protection information, including:

- Environmental protection documents;
- Reference information such as regulations and guidelines;
- Inspection reports; and
- Monitoring field data and reports.

The environmental inspection program will employ modern electronic recording, reporting and communication systems using field computers, geographic positioning systems and digital cameras. Field computers will have Project and other reference information needed for effective implementation of environmental protection measures, including regulations, guidelines, licences, permits, engineering drawings, specifications, maps, reports and data.

EPIMS is a tool that helps Manitoba Hydro monitor and report on environmental protection implementation, regulatory compliance and incident reporting. EPIMS will be the mechanism to provide reporting and tracking of environmental protection performance, and the foundation of an auditable EPP.

10.4 Pre-construction activities

Manitoba Hydro will undertake a number of activities prior to commencing construction of the Project to set the direction for environmental protection and compliance with legislated requirements. Manitoba Hydro will endeavour to meet with interested Indigenous communities and organizations during the finalization of the construction environmental protection plan to discuss, address and mitigate concerns, to the extent possible, with cultural and environmentally sensitive sites identified through the IEP and in the self-directed studies.

Manitoba Hydro will obtain licenses, permits, authorizations and other approvals, including property agreements, ROW easements and releases, prior to commencement of construction of each Project component. Additional terms and conditions of these approvals will be incorporated into the construction environmental protection plan. Additional approval requirements to be obtained by the contractors will be identified and communicated to the successful bidders.

The Licensing and Environmental Assessment Department will typically participate in the tender/direct negotiated contract development process to make sure environmental requirements are included as contract specifications. Bidders are required to list and defend their environmental record and must have an environmental policy, including a commitment to environmental protection.

Meetings will be held with the contractors to review the environmental protection requirements, establish roles and responsibilities, management, monitoring and other plans, inspection and reporting requirements, and other submittals. Prior to the start of construction, contractor employees will be trained and/or oriented on environmental protection requirements.

10.5 Work stoppage

The duty to stop work rests with everyone encountering situations where the environment, including biophysical, socio-economic and heritage resources, are threatened by an activity or occurrence that has not been previously identified, assessed and mitigated. Work stoppage is also to occur in the event of an environmental accident, extreme weather event or exposed human remains. Individuals discovering such situations are to inform their supervisor who will report the matter to the construction supervisor or environmental inspector/officer immediately. The contractor is also required to stop work voluntarily where construction activities are adversely affecting the environment or where mitigation measures are not effective in controlling environmental effects. Remedial action plans or other environmental protection measures will be developed and implemented immediately after discussion

and prior to resumption of work if previously halted. Work is not to resume until the situation has been assessed and responded to and Manitoba Hydro approves the resumption of work. Stop work orders will be documented, reported to regulatory authorities (if applicable) and reviewed at construction meetings.

10.6 Review and updating

10.6.1 CEnvPP annual reviews

The CEnvPP will be reviewed annually by Manitoba Hydro and may involve consultation with contractors, regulators and stakeholders.

10.6.2 Incident reviews

CEnvPP will be subject to review in the event of an incident, including environmental accidents, fires and explosions, reportable releases of hazardous substances and non-compliance situations.

10.6.3 Auditing

Auditing is a systematic approach to defining environmental risk and/or determining the conformance of an operation with respect to prescribed criteria. An environmental audit typically involves a methodical examination of evidence that may include interviews, site visits, sampling, testing, analysis, and verification of practices and procedures.

Environmental protection plans for the Project will be subject to internal and external audits through Manitoba Hydro's ISO 140001 Registration process. The audit results will help to evaluate the effectiveness of environmental protection measures, to learn from inspection and monitoring programs, and to improve Project planning and environmental assessment performance.

10.6.4 List of revisions

A list of revisions will be maintained at the beginning of each environmental protection plan that identifies the nature of the revision, section revised and dates.

10.7 Summary

This chapter outlined the environmental protection program under which environmental protection commitments, mitigation measures and follow-up actions identified in this EA Report will be implemented, managed, reported and evaluated. The purpose,

organization, responsibilities, management, communication and other aspects of the environmental protection program were described. Environmental protection plans are described as they relate to the construction, operation and decommissioning stages in the Project planning cycle and environmental assessment and licensing process. Implementation of follow-up actions, including inspection, management and auditing are discussed. Specific environmental management and monitoring plans are also identified.

