

FINAL REPORT

MANITOBA MINNESOTA TRANSMISSION PROJECT

AUGUST 31, 2023

Compiled by Manitoba Habitat Heritage Corporation



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INTRODUCTION

In April 2019, Manitoba Hydro was granted a license (No. 3288) under *The Environment Act* (C.C.S.M c. E215), and in June 2019 Manitoba Hydro was issued a Certification of Public Convenience and Necessity (EC-059) by the National Energy Board in accordance with the *National Energy Board Act* and the *Canadian Environmental Assessment Act, 2012*. for the construction, operation and maintenance of the Manitoba-Minnesota Transmission Project (MMTP). MMTP is a 213km long, 500 kV alternating current transmission line that exports/imports reliable and renewable energy to/from [Minnesota Power's](#) Great Northern Transmission Line. The MMTP extends from the Dorsey Converter Station (near Rosser, MB) to the U.S. border near Piney, MB.

Under Condition 26 of the Certificate of Public Convenience and Necessity, and Condition 36 of *The Environment Act* license Manitoba Hydro developed a No Net Loss of Wetlands Plan and a Wetland Offset Measures Plan (respectively) to mitigate the expected loss of wetland habitat associated with the development of Project activities at the Dorsey Converter Station, transmission tower locations and any other locations where wetlands were affected by the MMTP. Manitoba Hydro used an approach modeled on the Province of Manitoba's *The Water Rights Act* (C.C.S.M. c. W80) and the Water Rights Regulation 126/87 - Schedule D.

TABLE 1. WETLAND LOSS COMPENSATION CONTRIBUTION AGREEMENT BETWEEN MHHC AND MANITOBA HYDRO FOR THE MMTP.

Project Component	Wetland Loss (ha)	Ratio (3:1)	Valuation/ ha	Total Offset
Tower Foundations	0.186	3	\$14,820	\$8,270
Dorsey Converter Station	0.140	3	\$14,820	\$6,224
Total	0.326			\$14,494

In 2022, Manitoba Hydro entered into an agreement with the Province of Manitoba's Department of Natural Resources and Northern Development and the Manitoba Habitat Heritage Corporation (MHHC) to deliver the wetland offset component of the Wetland Offset Measures Plan and No Net Loss of Wetlands Plan for the MMTP (Manitoba Hydro 2020). The value of the agreement is \$14,494.

MHHC is the entity that was identified to manage a wetland offset fund on behalf of the Province. Any contributions by Manitoba Hydro in fulfillment of the obligation for wetland compensation for the MMTP would be made to MHHC to be held in trust for projects deemed appropriate by Manitoba Natural Resources and Northern Development. Such projects would be carried out by accredited third parties and may include (but are not limited to) restoration of wetlands in the same Manitoba watershed(s) or enhancement of existing wetlands and wetland complexes.

This final report details completed activities undertaken by MHHC to deliver the wetland offset fund for the MMTP and fulfills the reporting requirement as per Section 4.5 of the Contribution Agreement.

PROJECT AREA

Wetlands play an important role within the landscape. Wetland functions or the processes carried out by wetlands include filtration and improving water quality, regulation of water levels, and providing habitat for aquatic and semi-aquatic species. Wetlands are considered one of the most biologically diverse of all ecosystems. Wetlands impacted by the MMTP occur in the highly developed agricultural landscape of southern Manitoba, in the Lower Assiniboine, La Salle River, Cook's Creek/ Devil's Creek, Seine River, Rat River and Roseau River sub watersheds. Both boreal and prairie wetlands (fens, bogs, and marshes) are an excellent global carbon storage repository and are very fragile due to climate change pressures. In addition to carbon storage

and increased climate change resiliency values, these wetlands provide significant wildlife habitat for many species. Construction of the MMTP resulted in the permanent loss of 0.326 hectares of wetland habitat.

PROJECT DESCRIPTION

As compensation for the loss of wetland benefits associated with the MMTP, MHHC has secured one wetland habitat conservation agreement through perpetual securement. The secured property is located in one of the sub watersheds (Lower Assiniboine) impacted by the Project.

WETLAND SECUREMENT

Wetland and associated upland habitat are secured by MHHC through the purchase of Conservation Agreements (CAs) under *The Conservation Agreements Act* (C.C.S.M. c. C173) of Manitoba. CAs identify protected habitat on privately owned properties. When a CA is signed by the landowner, a caveat is placed on the land title to inform future owners of the conservation interest. The terms of the CA ensure that habitat protection will remain in place in perpetuity, even in the event of a change of ownership. The CA prevents breaking, burning, filling, draining, degrading, and conversion of the protected habitat. However, the land remains privately owned and may be used as pasture or other applications that do not result in damage to protected habitats. MHHC conducts annual compliance monitoring to ensure the terms of CA are adhered to and pursues appropriate habitat mitigation or compensation in the case of a violation.

Wetlands are among the most productive natural ecosystems in the world, yet more than half of all wetlands on the prairies have been lost since pioneer settlement began. Today, wetlands are increasingly recognized as integral components of a watershed and can aid in flood control, increase biodiversity, improve the quality of both surface and ground water and provide numerous aesthetic and recreational benefits to society.

PROJECT SCHEDULE

Wetland offsets were to be delivered within 5 years of signing of the agreement, as per the MMTP wetland plan. The wetland conservation agreement was finalized on May 16, 2023. This conservation agreement fulfills MHHC's responsibility for the wetland offset component of the MMTP wetland agreement

PROJECT JUSTIFICATION

Wetland securement completed under this agreement were selected based on the following criteria:

- Priorities outlined in the Wetland Offset Measures Plan and No Net Loss of Wetlands Plan developed for the MMTP prepared by Manitoba Hydro for Manitoba Sustainable Development and the National Energy Board, including:
 - A compensation ratio (3:1) and per hectare wetland valuation
 - Wetlands can be created, restored, or enhanced as wetland offsets
 - Offsets are to be completed with wetlands in the same watershed(s) as the Project.
- MHHC's standard criteria for assessing the merit of wetland securement projects. These criteria are based on both site-specific and landscape-level factors, including:
 - Canada Land Inventory (CLI) waterfowl habitat capability rating
 - Waterfowl breeding pairs per square mile (Ducks Unlimited DSS waterfowl modeling)
 - Acres of the various classes of wetlands (Stewart & Kantrud, 1971)
 - Number of basins of various classes of wetlands (Stewart & Kantrud, 1971)
 - Location relative to North American Waterfowl Management Program Target Landscape
 - Acres of associated native upland habitat

- Number of semi-permanent and permanent ponds (Class 4 and 5 wetlands) within 1 mile of a project site
- Wetland restoration potential
- Percentage of wetlands drained
- Distance to other secured wetland complexes
- Percentage of land under permanent cover (i.e. not cultivated – which can provide waterfowl nesting habitat availability)
- CLI soils capability rating
- The project was deemed appropriate for compensation by Manitoba Natural Resources and Northern Development (Appendix C).
- The project wetland was typical of a Manitoba prairie wetland with traditional use plant species present including nettles (*Stachys spp.*) and poplars (*Populus spp.*) (Manitoba Hydro 2017).

The secured wetland CA is situated in the Lower Assiniboine sub watershed, one of the sub watersheds impacted by Project construction (Fig. 1).

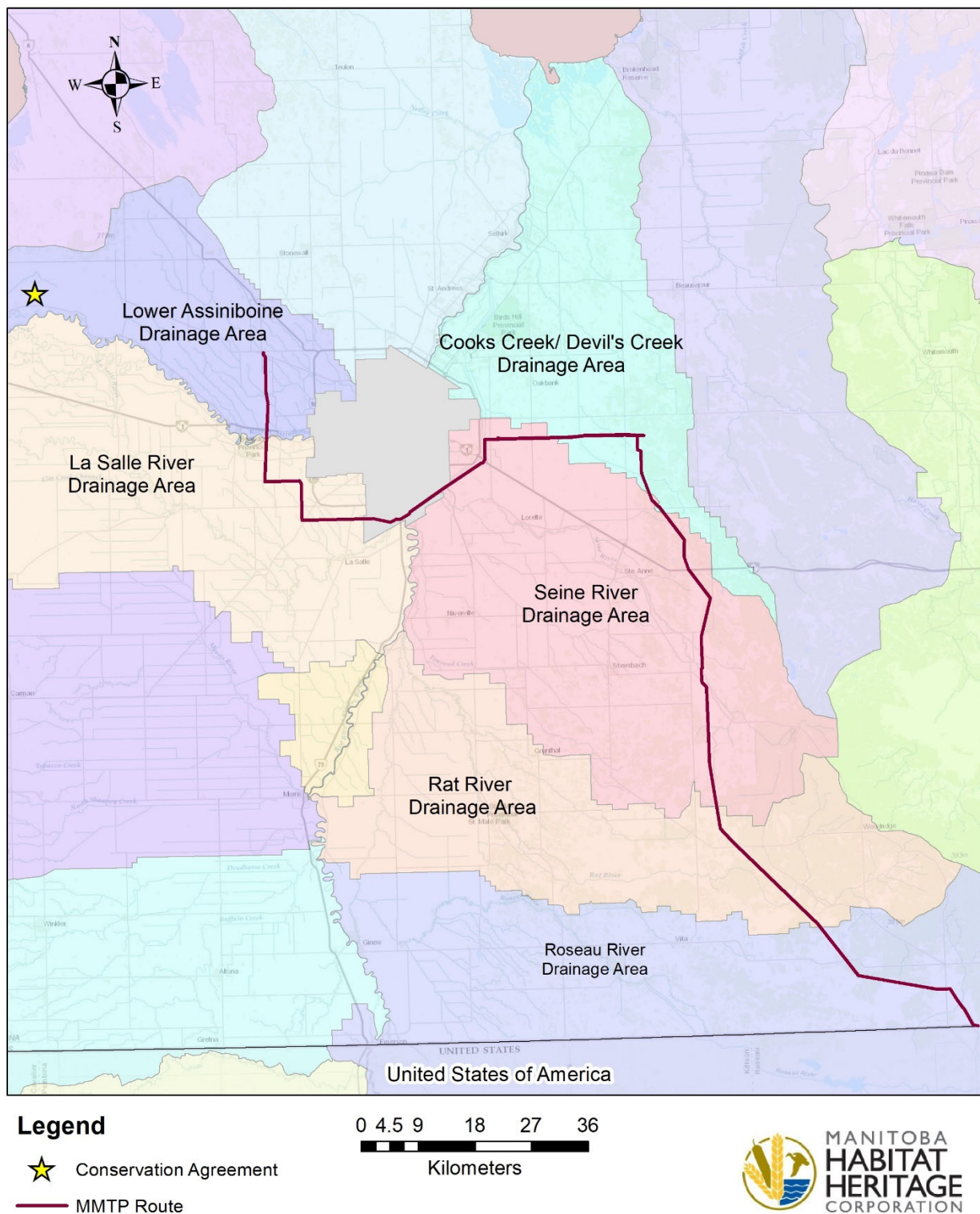


FIGURE 1. PROJECT MAP FOR THE MMTP AND WETLAND CONSERVATION AGREEMENT (6330-707).

PROJECT RESULTS

Habitat securement activities are shown in Table 1. The conservation agreement secured resulted in the perpetual protection of 15.1 hectares of wetlands and 40.1 hectares of uplands for a total of 55.2 hectares of habitat secured. This is in excess of the 0.98 hectares of wetlands required at the prescribed 3:1 ratio in the wetlands offset.

TABLE 2. SECUREMENT AS OF JULY 30, 2023

Securement	Wetland (ha)	Upland (ha)	Total Habitat (ha)
6330-707	15.1	40.1	55.2
Total Habitat Secured	15.1	40.1	55.2

FINANCIAL SUMMARY

Total project expenditures at project close are \$14,494.00. MHHC was able to secure the project for lower than projected per-hectare costs (Table 2). Due to the challenge of finding willing landowners to sign restoration contracts in the same watershed as the MMTP, MHHC was compelled to place its efforts into finding secured hectares to meet requirements. Securements enhance wetlands as they protect wetland habitat in perpetuity.

TABLE 3. WETLAND OFFSET OBJECTIVE AND ACTUALS FOR THE MMTP.

	Total Area (ha)	Total Cost	Cost/ha
Offset Target	0.98	\$14,494.00	\$14,820/ ha
Offset Actual	55.2	\$14,494.00	\$262.57/ ha
<i>Landowner Payment</i>		\$9,120.00	\$165.22/ ha
<i>Delivery</i>		4,348.00	
<i>Endowment</i>		1,026.00	
Actual Total	55.2	\$14,494.00	\$262.57/ ha

REFERENCES

Manitoba Hydro 2017. Manitoba-Minnesota Transmission Project Botanical and vegetation pre-construction survey. Prepared by Szwaluk Environmental Consulting Ltd. And K. Newman. 80 pp.

Manitoba Hydro. 2020. Manitoba-Minnesota Transmission Project Wetland Offset Measures Plan and No Net Loss Plan. Prepared for Manitoba Sustainable Development and the National Energy Board by Manitoba Hydro. 264 pp.

Stewart, R. E., and H.A. Kantrud. 1971. Classification of natural ponds and lakes in the glaciated prairie region. Resource Publication 92. Bureau of Sport Fisheries and Wildlife. Washington. U.S. 26 pp.

APPENDIX A – PROJECT PHOTOGRAPHS



FIGURE 2. WETLAND HABITAT ON THE CONSERVATION AGREEMENT 6330-707

Appendix B – Orthophoto of Conservation Land



Legend

 Conservation Agreement Lands

0 0.05 0.1 0.2 0.3 0.4
Kilometers

Service Layer Credits: Source: Esri, Maxar, Earthstar Geographics, and the GIS User Community



FIGURE 3. 6330-707 CONSERVATION AGREEMENT LANDS

APPENDIX C - APPROVAL BY MANITOBA NATURAL RESOURCES AND NORTHERN DEVELOPMENT

From: Meuckon, Cameron (ARD) <Cameron.Meuckon@gov.mb.ca>
Sent: Tuesday, July 26, 2022 11:48 AM
To: Kurt Mazur <kmazur@mhhc.mb.ca>
Subject: Re: [Caution: Suspicious Email] MMTP Wetland Offset

Hello

No concerns here. Please proceed with this project

Sent from my iPhone

On Jul 18, 2022, at 2:32 PM, Kurt Mazur <kmazur@mhhc.mb.ca> wrote:

CAUTION: This email originated from an External Sender. Please do not click links or open attachments unless you recognize the source.
ATTENTION: ce courriel provient d'un expéditeur externe. Ne cliquez sur aucun lien et n'ouvrez pas de pièce jointe, excepté si vous connaissez l'expéditeur.

Hi Cam,

We have a proposed conservation agreement that looks like a fit for the MMTP Wetland Offset requirements. The property is near Poplar Point and within the Lower Assiniboine watershed; MMTP also falls within this watershed. The project is strictly habitat securement which falls under the enhancement category of the Water Rights Act Regulation. The MMTP Wetland Offset Fund would partially pay to secure this habitat in perpetuity (total wetland acres = 85). Manitoba Hydro supports this proposed CA and I am requesting your comments and if acceptable we will proceed with this conservation agreement.

Thanks,

Kurt

Kurt Mazur

M.Sc. | Director of Conservation

Manitoba Habitat Heritage Corporation | kmazur@mhhc.mb.ca

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