RECLAMATION
Managing Water in the West

DK-5000-16-02

Finding of No Significant Impact and Final Environmental Assessment for Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

U.S. Department of the Interior
Bureau of Reclamation
Dakotas Area Office
Bismarck, North Dakota

September 2018

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UNITED STATES DEPARTMENT OF THE INTERIOR

BUREAU OF RECLAMATION
DAKOTAS AREA OFFICE
BISMARCK, NORTH DAKOTA

FINDING OF NO SIGNIFICANT IMPACT

OF

FINAL ENVIRONMENTAL ASSESSMENT

FOR

Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

NO. DK-5000-16-02

Recommended: _____ Date: 9/4/18
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Mission Statements

The mission of the Department of the Interior is to protect and provide access to our Nation's natural and cultural heritage and honor our trust responsibilities to Indian Tribes and our commitments to island communities.

The mission of the Bureau of Reclamation is to manage, develop, and protect water and related resources in an environmentally and economically sound manner in the interest of the American public.

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Introduction

Issuance of this Finding of No Significant Impact (FONSI) follows the completion of the Environmental Assessment for Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota.

The FONSI describes the reasons for the finding that the Proposed Action's anticipated impacts are insignificant. This document contains the FONSI and Final Environmental Assessment.

Finding of No Significant Impact and Final Environmental Assessment for Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

The Bureau of Reclamation (Reclamation) proposes to issue a water service contract for 20 cubic feet per second (cfs) of water from the McClusky Canal, a Special Use Permit (SUP), and to approve authorization of a preference power contract to Garrison Diversion Conservancy District (Garrison Diversion) for the Central North Dakota Water Supply (CNDWSP) (Figure 1). Garrison Diversion was made a cooperating agency to provide its special expertise on the CNDSWP, including developing information, data, and environmental analysis to assist Reclamation in preparing the Environmental Assessment (EA).

Garrison Diversion's request for a water service contract and preference power are in response to requests by communities in North Dakota who have determined that the projected industrial water needs cannot be met by existing supplies. A supplemental water supply is needed for continued growth and industrial development in the region and to support economic development in Central North Dakota.

The purpose of the Proposed Action is to consider the eligibility of Garrison Diversion to receive Pick-Sloan Missouri Basin Program (Program) preference power and a water service contract for 20 cfs from the McClusky Canal (Canal) as a source for water within the Missouri River Basin. A reliable municipal, rural, and industrial (MR&I) water supply is requested by Stutsman Rural Water District, Jamestown, Carrington, Central Plains Water District, Tuttle, and South Central Regional Water District for industrial water that will be used entirely within the Missouri River Basin in North Dakota.

The Proposed Action is needed because the area is currently not served by a reliable water supply sufficient to enable development of industrial growth and development in Central North Dakota. The Proposed Action is also intended to fulfill the purposes of the Garrison Diversion Unit Act of August 5, 1965 (79 Stat. 433) to provide for development of municipal and industrial water, among other purposes, and the Garrison Diversion Unit Reformulation Act of 1986 (100 Stat. 418), as amended by the Dakota Water Resources Act of December 21, 2000 (114 Stat. 2763). Congress' intent in enacting these statutes was to ensure that the water needs of the State of North Dakota were met, including industrial water needs, through development of the Garrison Diversion Unit by the Secretary of the Interior.

Garrison Diversion is designing and constructing the wholly state-sponsored Red River Valley Water Supply Project (RRVWSP), which will use an intake directly on the Missouri River as a water source. The state-sponsored RRVWSP will proceed independently and does not need approvals from Reclamation.

Garrison Diversion requested 20 cfs from the Canal, the Proposed Action, as an option for a portion of the water that would be supplied for industrial purposes for Stutsman Rural Water District, Jamestown, Carrington, Central Plains Water District, Tuttle and South Central Regional Water District. Garrison Diversion has reviewed other sources of water supply, including existing groundwater sources. These communities determined their projected industrial growth water needs will exceed the existing State Water Commission groundwater permits. Therefore, available industrial water allocations have the potential to limit future industrial development within the region.

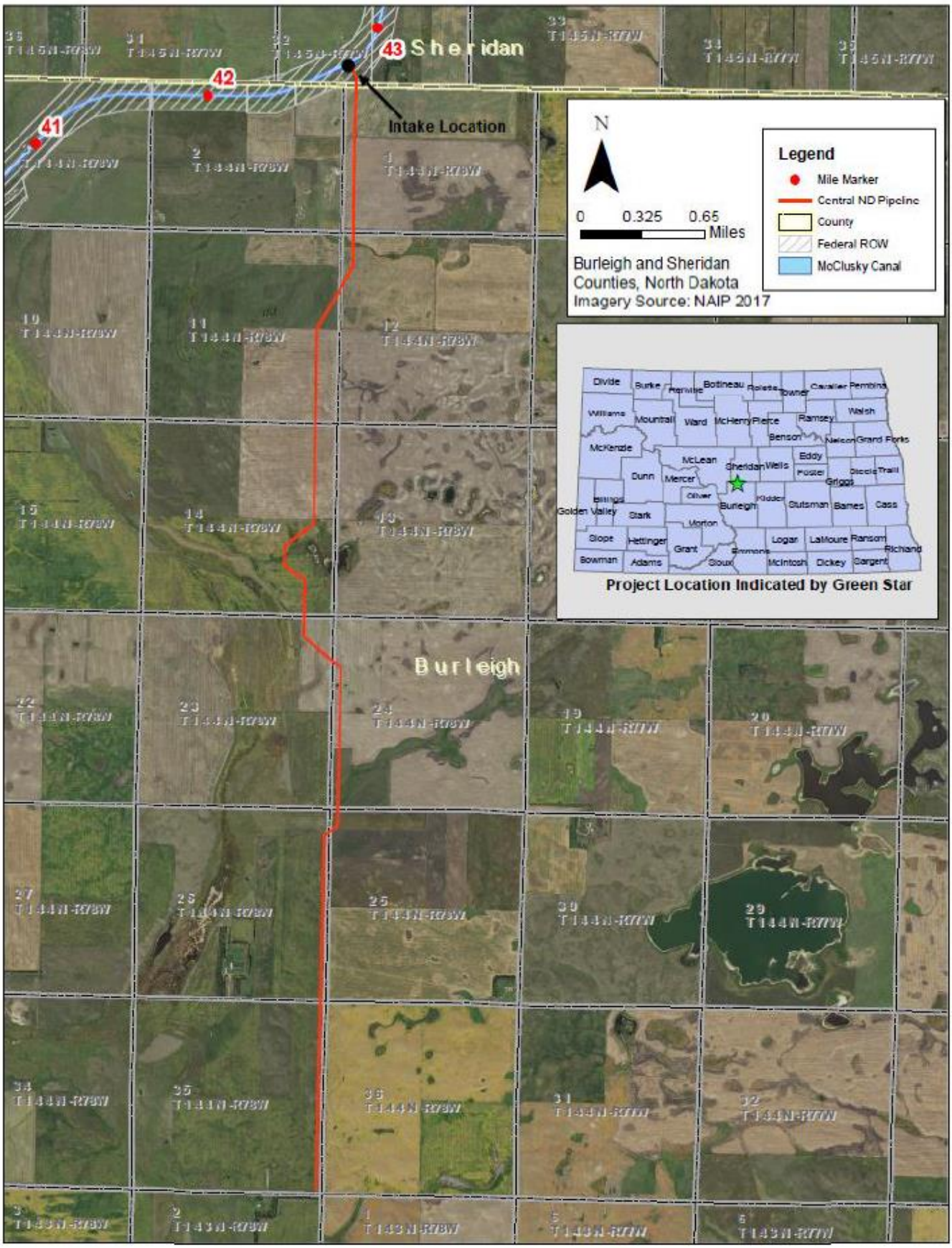
Proposed Action

Under the Proposed Action, Reclamation would enter into a water service contract and approve preference power to withdraw up to 20 cfs of water from the Canal to serve industrial water needs in areas of Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties within the Missouri River Basin, North Dakota in connection with Garrison Diversion's construction of the CNDWSP. Reclamation would also issue a SUP to construct and maintain the facilities needed to deliver the water on Reclamation-managed land. As described below, the CNDWSP also includes 6 miles of pipeline construction.

The CNDWSP would include:

1. Reclamation would issue a long-term (40 years) water service contract to Garrison Diversion, making up to 20 cfs (approximately 14,489 acre feet per year) of federal water available from the Canal for the CNDWSP.
    a. The proposed water service contract would utilize approximately 1.2% of the water appropriated to Reclamation from the North Dakota State Water Commission, under Permit No. 1416 for 1,212,348 acre-feet from the Missouri River for MR&I and other authorized purposes. The priority date of this water permit is February 9, 1967. The maximum amount of water allocated under this permit is based on beneficial use as defined by the state of North Dakota water law.
2. Reclamation would determine project eligibility for P-SMBP preference power to Garrison Diversion for the CNDWSP.
3. Reclamation would issue a SUP (25 years) to Garrison Diversion to construct and maintain the facilities required on Reclamation land (as described below) and provide for regular and emergency maintenance access. Facilities include an intake in the Canal, wet well, pump station, and approximately 0.10 miles of the 6 mile of pipeline.
4. Reclamation would issue a SUP to the utility company for installation of power lines on or across Reclamation land to power the pump station.
5. The CNDWSP also includes 6 miles of the pipeline for delivery of up to 20 cfs from the Canal to the state-sponsored RRVWSP. This component of the Proposed Action does not require Reclamation approval, however it is dependent upon Reclamation's approval of a water service contract and SUP as described above thus is analyzed as part of the Proposed Action.

Figure 1. Overview of the Project Area.



Public Involvement, Consultation, and Coordination
Reclamation issued a scoping notice on November 18, 2018 (Appendix C of the Final EA). Seven agency letters of response were received: North Dakota Department of Health, North Dakota Geological Survey (State Geologist), North Dakota Geological Survey (State Paleontologist), North Dakota State Historical Preservation Office, North Dakota Department of Transportation, North Dakota Game and Fish Department, and the State Water Commission. Multiple phone calls and email correspondence took place between Reclamation and the U.S. Fish and Wildlife Service regarding wetland easements.

Reclamation released a draft EA on August 17, 2017. Multiple comments were received including a request for a 30-day extension for review from Missouri Department of Natural Resources (DNR). Reclamation granted a 15-day extension for additional review. Comments were received from the Bureau of Indian Affairs, Coalition to Protect the Missouri River, Global Affairs Canada, Province of Manitoba Sustainable Development, Missouri DNR, North Dakota Trust Lands, North Dakota Department of Health, and the North Dakota State Water Commission (Appendix A of the Final EA).

Public comments on the draft EA resulted in the following primary changes to the document:

- Purpose and Need Discussion – provided additional information to clarify the need for the Proposed Action;
- Connected Action Discussion – provided additional information for clarification;
- Geographic Scope and related Cumulative Impact Analysis – provided additional information for clarification;
- Compliance with the 1909 Boundary Waters Treaty – included a discussion of the infrastructure/controls included to keep Missouri River water for the Proposed Action within the Missouri River Basin;
- In response to comments regarding impacts from Missouri River depletions, Reclamation expanded the discussion of the Missouri River Mainstem System. Reclamation described how the U.S. Army Corps of Engineers (USACE) operates this integrated system of dams and reservoirs and discloses the analysis of potential effect which utilized the results of the most recently completed comprehensive analysis of Missouri River depletions.

Reclamation released a revised draft of the EA on April 17, 2018. Missouri DNR requested a 30-day extension for review. Reclamation granted a 15-day extension for additional review of the revised draft EA. Comments were received from the City of Carrington, Coalition to Protect the Missouri River, Global Affairs Canada, Province of Manitoba Sustainable Development, Missouri DNR, McLean-Sheridan Rural Water District, North Dakota Department of Health, North Dakota State Water Commission, and North Dakota Department of Transportation (Appendix B of the Final EA). The comment letters on the revised draft EA and Reclamation's responses are included in Appendix B of the Final EA. Reclamation made several minor changes to the revised draft EA in response to public comments. These changes involved minor corrections and clarifications. There were no substantial changes to the alternatives or the effects analysis.

Documents throughout the project timeline have been made available on Reclamation's Dakotas Area Office website at: https://www.usbr.gov/gp/dkao/index.html.

Approximately 50 individuals including Native American Tribes, North Dakota's congressional delegation, appropriate state and federal agency contacts, associated county government auditor offices, private individuals, non-government organizations and 3 published newspapers, the Bismarck Tribune, McClusky Gazette, and Jamestown Sun were contacted throughout the Project (Appendix D).

Summary of Environmental Effects
Context 40 C.F.R. § 1508.27.
The project is located in Central North Dakota in Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties located within the Missouri River Basin. The Proposed Action will be limited in geographic context. The environmental effects as described in the EA and summarized below will not be noticed beyond the local scale.

Intensity
The following discussion is organized around the 10 significance criteria described in 40 C.F.R. § 1508.27.

1. **Impacts that may be both beneficial and adverse**--The Proposed Action would impact resources as described in the EA. There are no predicted long-term effects associated with the Proposed Action. Beneficial effects include a reliable water supply source for industrial needs for the communities of Stutsman Rural Water District, Jamestown, Carrington, Central Plains Water District, Tuttle and South Central Regional Water District. Impacts from construction would be temporary and approximately 0.20 acre of land would be impacted permanently from the pump station and associated facilities on the Canal. Impacts from the 6-mile pipeline would be temporary and all land disturbed would be restored to previous conditions.

   Emissions of CO_2 and other GHGs from the construction component of the Proposed Action would be low and would not substantively contribute to climate change. Based on climate projections, trends of increased temperature and increased precipitation are expected for the northern Great Plains from 2040-2069. Based on this prediction, Reclamation does not expect water availability for 20 cfs to change in that timeframe.

2. **Degree to which the selected alternative will affect public health or safety or a minority or low income population**--The Proposed Action would have no significant effects on public health or safety. No minority or low income populations would be disproportionately affected by the Proposed Action.

3. **Unique characteristics of the geographic area of the Proposed Action--**There are no park lands, prime farm lands, wetlands, wild and scenic rivers, or ecologically critical areas that would be negatively impacted by the proposal.

   No approval(s) would be needed from the U.S, Army Corps of Engineers (USACE) as all wetlands would be avoided by the CNDWSP. Environmental commitments (Table 1; Chapter 2 of the Final EA) include Garrison Diversion to meet with the U.S. Fish and Wildlife Service prior to construction regarding the avoidance of wetland easements within the area. For the CNDWSP to avoid the two easements, the pipeline would either bore underneath the easements or reroute around the easements.

   No approval(s) would be needed from the USACE regarding the water intake on the Canal for the CNDWSP. The Canal has an exemption (r) to Section 404 of the Federal Water Pollution Control Act of 1972 (P.L. 92-2500), as amended by the Clean Water Act of 1977 (P.L. 92-217) under sub-Section 404(r). Based on a request and supporting documentation from Reclamation, the USACE previously concluded in a 2007 determination that Reclamation had submitted information necessary to fulfill the requirement for the 404(r) exemption for the principal works of the Garrison Diversion Unit, which includes the

McClusky Canal. The USACE was included in the distribution list for this action and provided no comments on the draft EA or the FONSI.

4. **Degree to which the effects of the Proposed Action on the quality of the human environment are likely to be highly controversial.** --Under NEPA, the degree to which the effects of the Proposed Action on the quality of the human environment are likely to be highly controversial is determined by whether there are substantial questions that are raised by experts as to whether a project may cause significant degradation of some human environmental factor or there is a substantial dispute among the experts about the size, nature, or effect of the action. No effects on the quality of the human environment from the Proposed Action have been identified that can be considered highly controversial.

   Reclamation recognizes that some commenters have objected to aspects of the Proposed Action based on their perceptions of its environmental effects. This type of public opposition does not make a project "highly controversial" for NEPA purposes, but those concerns are addressed here for completeness. Some commenters have expressed the concern that inter-basin transfer of water from the Missouri River to the Hudson Bay basin will result in invasive species or other harmful biota negatively impacting Canadian waters.

   Pursuant to the Dakota Water Resources Act of 2000, Congress directed Reclamation to ensure that, "[p]rior to construction of any water systems authorized under this Act to deliver Missouri River water into the Hudson Bay basin, the Secretary … must determine that adequate treatment can be provided to meet the requirements" of the Boundary Waters Treaty of 1909.

   This Proposed Action does not authorize construction of a water system to deliver Missouri River water into the Hudson Bay Basin. The proposed Water Service Contract providing up to 20 cfs of federal water from the Canal will include a condition that the water is for use only in the Missouri River Basin. Therefore there are no inter-basin impacts as a result of the CNDWSP and no highly controversial effects. Further, the state-sponsored RRVWSP will proceed independent of the CNDWSP and does not need approvals from Reclamation. Garrison Diversion requested 20 cfs to be utilized and maintained within the Missouri River Basin; the effects of the requested diversion, minimal amount of surface disturbance associated with pipeline and intake construction are well known and understood.

   Commenters have also raised an issue regarding Reclamation's analysis of the impacts of depletions. As stated in 1(a) of the Proposed Action, the proposed water service contract would utilize approximately 1.2% of the water appropriated to Reclamation from the North Dakota State Water Commission, under Permit No. 1416 for 1,212,348 acre-feet from the Missouri River for MR&I and other authorized purposes. The priority date of this water permit is February 9, 1967. The maximum amount of water allocated under this permit is based on beneficial use as defined by the state of North Dakota water law.

   Currently, the average annual depletion in the Missouri River above Garrison Dam is approximately 6.6 million acre-feet (Reclamation 2007[1]). Thus, withdrawal of an additional 14,483 acre-feet per year would increase annual depletions by about 0.2 percent. Due to the annual depletion for the Proposed Project of 14,483 acre feet, which represents only 0.06

[1] 2007. Final Environmental Impact Statement Red River Valley Water Supply Project. Bureau of Reclamation Dakotas Area Office, Bismarck, North Dakota. 541 pages.

percent of Lake Sakakawea's storage capacity, the effects on reservoir levels and dam releases would likely not be measurable.

The 2013 depletion analysis completed by Reclamation and the USACE included a thorough evaluation of historic, present and reasonably foreseeable future actions as explained in the technical report[2] and Reclamation's Final SEIS[3] and supporting documents. Reclamation reviewed the data used in the Final SEIS depletion analysis to identify any significant changes to the data and determined the data and evaluation methods used remain valid today. In a review of the reasonably foreseeable future actions evaluated in the 2013 technical report, Reclamation noted a few of the foreseeable projects have changed slightly; however the overall change in the volume of water for the reasonably foreseeable future actions was nearly zero. The changes include a couple of the reasonably foreseeable future actions have not been realized and the volume of water included for the state-sponsored RRVWSP has increased slightly from the volume that was included in the Final SEIS analysis (from 122 cfs to 165 cfs). But again, the net change in the volume of reasonable foreseeable future action depletions is nearly zero.

Potential impacts of the CNDWSP on the Missouri River Mainstem System will be very similar to the potential impacts disclosed in the Final SEIS for the Northwest Area Water Supply Project and those impacts were negligible.

None of the anticipated impacts of the Proposed Action are highly controversial.

5. **Degree to which the effects of the Proposed Action on the human environment are highly uncertain or involve unique or unknown risks**--As described above, the project is not unique or unusual. The effects of issuing water service contracts, determination of preference power eligibility, and SUPs for pipeline and intake construction are well known and have been ongoing in the region and throughout the 17 western states for which Reclamation has responsibility to enter into such agreements. The environmental effects are described in the EA, and there are no effects that are considered to be highly uncertain or to involve unique or unknown risks.

6. **Degree to which the Proposed Action sets a precedent for future actions with significant effects or represents a decision in principle about a future consideration**--Reclamation operates the Canal to fulfill the purposes of the Garrison Diversion Unit Act of August 5, 1965 (79 Stat. 433) to provide municipal and industrial water, among other purposes, and the Garrison Diversion Unit Reformulation Act of 1986 (100 Stat. 418), as amended by the Dakota Water Resources Act of December 21, 2000 (114 Stat. 2763) to meet the water needs of the State of North Dakota. Reclamation is also authorized to determine project eligibility to receive Pick-Sloan preference power under the Act of June 17, 1902 (32 Stat. 388) and acts amendatory of or supplementary to that Act, particularly the Reclamation Project Act of 1939 (53 Stat. 1187), as amended, the Flood Control Act of 1944 (Pub. L. 78-534; 57 Stat. 887), and the Garrison Diversion Unit Act of August 5, 1965 (79 Stat. 433), as amended and supplemented by: Title II of the Energy and Water Development Appropriation Act of July 16, 1984 (98 Stat. 403); the Garrison Diversion Unit Reformulation Act of May 12, 1986 (100 Stat. 418); and the Dakota

[2] U.S. Army Corps of Engineers. 2013. Cumulative Impacts to the Missouri River for the Bureau of Reclamation's Northwest Area Water Supply Project. Missouri River Basin Water Management Division under the Northwestern Divisions of the Corps. 131 pp.

[3] Bureau of Reclamation. 2015. Final Supplemental Environmental Impact Statement Northwest Area Water Supply Project. Dakotas Area Office- Bismarck, ND.

Water Resources Act of December 21, 2000 (114 Stat. 2763). The Proposed Action would be authorized pursuant to these authorities and would be constructed with funds in whole or in part by the local users and the State of North Dakota. The decision would not limit later management decisions for proposals for diversions of water from the Canal, for a preference power contract, or for a SUP and does not set a precedent for future actions or represent a decision in principle about a future action.

7. **Whether the action is related to other actions with individually insignificant but cumulatively significant impacts**--Reclamation considered whether the state-sponsored RRVWSP needed to be considered in the EA. The State of North Dakota plans to use state and local funding to construct, operate and maintain the state-sponsored RRVWSP. This project will provide a supplemental water source for central and eastern counties in North Dakota during times of water scarcity to protect public health, ensure ongoing economic vitality, and provide for environmental benefits in the river systems (http://www.rrvwsp.com/about/).

   The state-sponsored RRVWSP is an independent project that will be completed solely by the state, without Reclamation approvals or funding. Although originally proposed as a joint state/federal project, since federal authorization for the project was never finalized, the State of North Dakota, communities, and local users are pursuing a separate, but similar state-sponsored RRVWSP independently. The State of North Dakota authorized up to $30 million for the 2017-2019 biennium to complete design and initiate construction of portion of the state-sponsored RRVWSP. The state-sponsored RRVWSP is being funded by the state, communities, and local water users.

   Reclamation's decision as to whether to approve a 20 cfs water supply contract, SUP and authorization of a preference power contract will have no bearing on whether the state-sponsored RRVWSP proceeds and as such, the state-sponsored RRVWSP is not a connected action. Because Reclamation lacks control over the RRVWSP through its decision about whether to approve the water supply contract, Reclamation has determined that the appropriate geographic scope of the Proposed Action is to evaluate the impacts within the project area as described in the EA, plus the cumulative effects of the portion of the RRVWSP that occur within the Project Area. The EA is properly limited to the direct, indirect and cumulative impacts of the Proposed Action.

8. **Degree to which the action may adversely affect sites, districts, buildings, structures, and objects listed in or eligible for listing in the National Register of Historic Places or cause loss or destruction of significant cultural resources**--The Canal ROW was originally surveyed by the River Basin Survey staff of the Smithsonian in 1966 (Mallory 1966[4]). Additional surveys were performed by University of North Dakota Archaeological Research (UNDAR) in 1997

[4] Mallory, O. 1966. *An Appraisal of the Archaeological Resources of the Garrison Diversion Project, North Dakota, November 1966*. A Project of the Inter-Agency Archaeological and Paleontological Salvage Program. Prepared by the River Basin Surveys, Smithsonian Institution. Manuscript on file at the State Historical Society of North Dakota, Bismarck, ND.

(Wermers and Klinner 1998[5]) and 1998 (Wermers and Klinner 1999[6]), along with evaluative test excavations in 2000 (Klinner et al. 2002[7]). Activities under the Proposed Action would occur within in the Canal ROW and in parcels of private land adjacent and south of the Canal. No historic properties are located within the Canal ROW. Reclamation lands in a previously surveyed or disturbed area with a lack of historic properties, and issuance of special use permits and temporary water service contracts, represents exempted activities under the *Programmatic Agreement between the Bureau of Reclamation, the Advisory Council on Historic Preservation, and the North Dakota State Historic Preservation Officer for the Implementation of Reclamation Undertakings in North Dakota (MOU No. 3-FC-60-03300),* Part II(c) (1) and Appendix I (B) (5). A Class I and Class III cultural resource inventory will be completed for the portions of the Project Area that fall outside of the existing Canal ROW prior to the commencement of ground-disturbing activities.

Under the NHPA, criteria are used to determine a cultural resource site's NRHP eligibility (36 CFR 60.4). In addition, criteria in 36 CFR Part 800 are applied to determine effects to historic properties. Any new cultural resources and historic properties identified during the survey(s) will be evaluated for listing on the NRHP, as necessary. Newly recorded resources whose significance cannot be established prior to disturbance will be left unevaluated for the NRHP. Previously identified cultural resources and historic properties outside of the Canal ROW will be assessed based on their previous NRHP evaluations.

- Cultural resources determined to not be NRHP eligible are managed to the discretion of Reclamation.
- The preferred treatment of the unevaluated cultural resource sites would be avoidance. However, if avoidance is not possible, the unevaluated sites within the area of potential effect would be evaluated for eligibility to the NRHP. Reclamation would then consult with the NDSHPO on the determination of NRHP eligibility and effects in accordance with the NHPA.
- As stated above, cultural resource sites that are included in or eligible for listing on the NRHP are given special status as historic properties. The preferred treatment of historic properties would be physical avoidance through the planning and design of activities and facilities and/or the avoidance of adverse effects. Reclamation would consult with the NDSHPO on the determination of effect in accordance with the NHPA if avoidance is not possible. The resolution of adverse effects would be done in consultation with the NDSHPO and tribes.

9. Degree to which the action may adversely affect an endangered or threatened species or its habitat that has been determined to be critical under the Endangered Species Act of 1973--

[5] Wermers, G. L. and D. Klinner. 1998. *McClusky Canal Cultural Resources Inventory of Selected Areas in Burleigh and McLean Counties, North Dakota*. Department of Anthropology and Archaeology, University of North Dakota, Grand Forks. Submitted to the U.S. Bureau of Reclamation, Dakotas Area Office, Bismarck, ND.

[6] Wermers, G. L. and D. Klinner. 1999. *McClusky Canal 1998 Cultural Resources Inventory of Selected Areas in Burleigh, Sheridan, and McLean Counties, North Dakota.* Department of Anthropology and Archaeology, University of North. Dakota, Grand Forks. Submitted to the U.S. Bureau of Reclamation, Dakotas Area Office, Bismarck, ND.

[7] Klinner, D., G, Werners, and D. Toom. 2002. *McClusky Canal 2000 Evaluative Test Excavations at Archeological Sites 32BL144, 32BL145, 32BL175, 32ML896, 32ML899, and 32ML901,'Burleigh and McLean Counties, North Dakota.* Department of Anthropology and Archaeology, University of North Dakota, Grand Forks. Submitted to the U.S. Bureau of Reclamation, Dakotas Area Office, Bismarck, ND.

The U.S. Fish and Wildlife Service Information, Planning, and Conservation System includes the following species and designated critical habitat for the counties within the Action Area: interior least tern, whooping crane, piping plover and its designated critical habitat, rufa red knot, pallid sturgeon, gray wolf, and the northern long-eared bat. The Action Area lies between two areas of designated critical habitat. McLean 8 occurs approximately 14 miles northwest and Burleigh 1 occurs approximately 16 miles southeast from the Action Area. No designated critical habitat for the piping plover occurs within the Action Area. No endangered species are known to occupy the Action Area; however, Reclamation will require that Garrison Diversion incorporate into their construction plans, instructions to the contractor that in the event that any threatened or endangered species are encountered during activities, the contractor will stop work and immediately contact Reclamation. Reclamation will consult with the USFWS to determine the appropriate steps to avoid any effects to these species, including cessation of construction. Reclamation has determined the Proposed Action would have no effect on federally-listed species and designated critical habitat.

10. **Whether the action threatens a violation of federal, state, local, or tribal law, regulation or policy imposed for the protections of the environment--**The Proposed Action violates no federal, state, tribal, or local environmental protection laws.

    The 20 cfs of Missouri River water to be used by the CNDWSP would not preclude any of the Missouri River tribes' right or ability to exercise their water right to the Missouri River. Reclamation has determined the Proposed Action would have no impacts to Indian Trust Assets.

Environmental Commitments

All applicable Federal and State environmental laws, regulations, and executive orders would be adhered to. Reclamation is including a list of environmental commitments (Table 1; Chapter 2 of the Final EA) as part of the Proposed Action to be implemented in order to (a) prevent, minimize, or offset the occurrence of potential adverse environmental effects and (b) ensure compliance with applicable Federal and State regulations designed to protect fish and wildlife resources, important habitats and sensitive areas, cultural and paleontological resources, human health and safety, and the public interest.

Under the Proposed Action, Reclamation will require Garrison Diversion to implement the following environmental commitments prior to and/or during construction of the CNDWSP. Appropriate environmental commitments will be incorporated into the designs, construction contracts, and specifications of the project. Reclamation may assemble an Interagency Environmental Review Team, with appropriate agency representation, to review environmental compliance in the field, if deemed appropriate.

Table 1. Environmental Commitments regarding the Central North Dakota Water Supply Project.

General Best Management Practices
Comply with all appropriate Federal, State, and Local laws.
Follow recommended practices for construction, restoration, and maintenance.
Dump grounds, trash piles, and potential hazardous waste sites will be avoided.
Standard construction industry measures will be taken to minimize fugitive dust emissions during construction activities. Any complaints that may arise will be dealt with in a timely and effective manner.
Equipment will be washed prior to entering the construction site to prevent the spread of noxious and invasive species.

Surface Water and Wetlands

Garrison Diversion will be responsible to comply with the Clean Water Act and avoid permanent impacts to wetlands. The pipeline in the project area will avoid wetlands by either boring underneath wetlands or rerouting around the wetlands.

Woody species including those bordering wetlands, shelterbelts, riparian woodlands, woody draws, or woodland vegetation will be avoided to the extent possible. For unavoidable impacts to woody habitats, replacement plants at a 2:1 ratio of appropriate speciation will be planted.

Erosion control measures will be employed as appropriate:

(a) Care will be exercised to preserve existing trees along the streambank.
(b) Stabilization, erosion controls, restoration, and re-vegetation of all streambeds and embankments will be performed as soon as a stream crossing is completed and maintained until stable.

Riparian woody shrubs and trees will be replanted where and as necessary to preserve the shading characteristics of the watercourse and the aesthetic nature of the streambank.

Conditions of a water service contract will include: maintaining use of the proposed 20 cfs in the Missouri River Basin and water will not be provided to distributions systems that deliver water into the Hudson Bay Basin.

Garrison Diversion will apply for a 401 Water Quality Certification permit for discharge of storm water runoff from the North Dakota Department of Health Division of Water Quality, as appropriate.

Garrison Diversion's will report any spill immediately to the North Dakota Department of Health, and will perform remedial actions as directed by the North Dakota Department of Health.

The Office of the State Engineer (OSE) requests to be notified regarding the proposed project's impacts, if any, to water resources such as watercourses (i.e. streams or rivers), agricultural drains, and wetlands (i.e. ponds, sloughs, lakes, or any series thereof) as any alternations, modifications, improvements, or impacts to those water resources may require a drainage permit(s) or a construction permit(s) from the OSE. Garrison Diversion will apply for the permits, as necessary, through the North Dakota State Water Commission.

Intake Screen Design

Intake screen designs will comply with the State/Federal Agency Fish Screen Guidelines: Intakes shall be screened and maintained with a ¼ inch or smaller mesh size opening.

Intake velocities shall not exceed ½ foot/second with 20 feet of overhead water.

Intake velocities shall not exceed ¼ foot/second if 20 feet of overhead water cannot be achieved.

The intake shall be placed at a maximum practicable depth in relation to extreme, low water elevations.

Intakes shall be marked so they are observable during day and night hours, as appropriate.

Work will not take place in the Canal from April 15 to June 1.

Contact the NDGF to inspect any and all vehicles, vessels, pumps, and equipment that will be used in project waters. A minimum 72-hour notice must be provided to the NDGF for scheduling an inspection (701-368-8368).

Fish and Wildlife Species and Habitat

Construction will avoid:

- Wetlands
- Federal, State, and Local wildlife areas and refuges
- Designated critical habitats

To minimize impacts to fisheries resources any stream identified as a fishery (fisheries – confirm with NDGF) that cannot be directionally bored will be avoided from April 15 to June 1 and crossed later in the summer or fall when flows are low or the stream is dry.

Any new, above ground power lines and an additional equal length of existing power lines in the same vicinity must be marked with visibility enhancement devices to benefit migrating whooping cranes as well as all migratory birds and bats.

Construction within 660 feet of visible nesting bald eagles will be avoided from February through August.

If threatened or endangered species are identified and encountered during construction, all ground-disturbing activities in the immediate area will be stopped until Reclamation can consult with the USFWS to determine appropriate steps to avoid impacting the species.
If any tree (with a diameter of greater than 3 inches) removal activities cannot be avoided between April 1 and October 31, consultation will take place with the USFWS.
Native prairie will be avoided to the extent possible. However, if native prairie sod must be broken, existing topsoil will be carefully salvaged and replanted with native grasses in a timely manner, with a seed mix recommended by the local Natural Resources Conservation Service (NRCS) and approved by Reclamation and the landowner.
Any new signage will be placed in a manner as to not allow raptors to perch by covering the top two holes of the post.
Garrison Diversion, as the contracting partner, assumes responsibility to ensure mitigation for all unavoidable wetland and other wildlife habitat loses with equivalent (like) habitat according to local, state and federal regulations.
Reclamation will ensure the USFWS is provided with the latest-version route maps of the pipeline delivery system to ensure that the USFWS appropriate Refuge and Wetland Management District personnel can identify where the pipeline and USFWS lands interface, allowing for identification of an avoidance route for the contractor. The USFWS advised on two wetland easement tracts crossed by the proposed pipeline alignment. If the alignment crosses the easement, the USFWS requests a meeting with Garrison Diversion and Reclamation before siting or construction for avoidance purposes. The pipeline in the project area will avoid the easements by either boring underneath the easements or rerouting around the easements.
Cultural Resources
All cultural resource investigations will be performed according to the procedures specified in the programmatic agreement among Reclamation, the North Dakota State Historic Preservation Office (NDSHPO), and the Advisory Council on Historic Preservation for Reclamation activities in North Dakota. Cultural resource inventories will be performed under the direction of an archaeologist that meets the Secretary of the Interior's Professional Qualifications Standards (48 FR 44738-9). All appropriate cultural resource activities will be completed prior to the commencement of ground-disturbing activities, including Class I and Class III surveys and consultation with the NDSHPO. All cultural resources, except those exempted in the programmatic agreement, will be avoided if their significance cannot be established prior to disturbance. If avoidance is not practicable, Reclamation, in consultation with the NDSHPO would determine if the site is eligible for nomination to the National Register of Historic Places [36CFR800.4(c) and 36CFR60.4]. If the site is eligible as a historic property, initially Reclamation, NDSHPO, and other interested parties, depending on the type of property, will consult to determine a plan of mitigation. If an adverse effect cannot be avoided, the Advisory Council on Historic Preservation will be contacted. All ensuing activities will comply with the NHPA, as amended, and the Archaeological Resource Protection Act.
The Tribes will be consulted concerning the locations of unmarked burials or cemeteries. All such burials or cemeteries will be avoided to the extent possible. If a burial or cemetery cannot be avoided or is encountered during construction, Reclamation will comply with the Native American Graves Protection and Repatriation Act if graves are discovered on Federal or trust lands or within reservation boundaries. Reclamation will comply with North Dakota Century Code 23-06-27: "Protection of Human Burial Sites, Human Remains, and Burial Goods" for graves on private or State-owned lands.
If unrecorded cultural resources or traditional cultural properties are encountered during construction, all ground disturbance activity within the area will be stopped, Reclamation and appropriate authorities will be notified, and all applicable stipulations of the NHPA will be followed. Activities in the area will resume only when compliance has been completed.
Paleontological Resources
Reclamation consulted with North Dakota Geological Survey to identify areas for paleontological survey where significant fossils are likely. If fossils are encountered, Garrison Diversion will contact the North Dakota Geological Survey for further information.

Agency Decision

The decision is to move forward with the Proposed Action and enter into a water service contract, SUP and provide preference power with Garrison Diversion for the CNDWSP. The Proposed Action is consistent with Congress' direction to Reclamation to assist in meeting North Dakota's water needs. Reclamation fully considered the comments received on the Proposed Action and addressed them in revisions to the EA as well as in responses to comments. For the reasons discussed herein, Reclamation has found that the Proposed Action will not have a significant adverse effect on the environment and therefore does not require an environmental impact statement. Although the environmental effects of the Proposed Action were determined to be not significant, the decision also incorporates environmental commitments in order to take a conservative approach.

Comments on Draft FONSI and Final EA

Per 40 CFR §1501.4(e)(2) Reclamation made the FONSI available for public review for 30 days (pages 15-16). Eight comments were received during the public review period for the draft FONSI and final EA (pages 17-35).

Reclamation would like to clarify that the Coalition to Protect the Coalition to Protect the Missouri River, Global Affairs Canada, Province of Manitoba Sustainable Development, and Missouri DNR were included in correspondence regarding the CNDWSP after their expressed interest in the project during the draft release of the EA in August 2017.

Reclamation acknowledges the comments provided and concludes no substantial revisions are necessary to the FONSI and EA. However, Reclamation has provided additional explanation regarding the Clean Water Act Section 404(r) exemption for the McClusky Canal above.

United States Department of the Interior

BUREAU OF RECLAMATION
Great Plains Region
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

IN REPLY REFER TO:

DK-5000-16-02
ENV-6.00

JUL 27 2018

Subject: Bureau of Reclamation's Release of the Draft Finding of No Significant Impact and Final Environmental Assessment for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Dear Interested Party:

The U.S. Department of the Interior, Bureau of Reclamation (Reclamation) has released for public review the Final Environmental Assessment (EA) and Draft Finding of No Significant Impact (FONSI) for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project. Reclamation prepared these documents in consultation with its cooperating agency, Garrison Diversion Conservancy District, and in accordance with the National Environmental Policy Act of 1969 (NEPA; 42 U.S. Code 4321, et seq.), the Council on Environmental Quality's Regulations for Implementing the Procedural Provisions of NEPA (40 Code of Federal Regulations [CFR] 1500–1508), the U.S. Department of the Interior's NEPA regulations (43 CFR 46), and other relevant federal and state laws and regulations.

Reclamation prepared this Final EA to analyze the environmental, social, and economic impacts of issuing a water service contract to the Garrison Diversion Conservancy District. The draft FONSI has been prepared to document the environmental review and evaluation of the proposed action in the EA. Per 40 CFR §1501.4(e)(2), Reclamation is making the FONSI available for public review for 30 days. The review period will be open until August 31, 2018.

A digital copy of the final EA and draft FONSI are located at https://www.usbr.gov/gp/dkao/index.html. Hard copies of the final EA and draft FONSI may be obtained by calling Kate Kenninger, Natural Resource Specialist, at 701-221-1282 or by requesting in writing from Area Manager, Bureau of Reclamation, P.O. Box 1017, Bismarck, North Dakota 58502.

Subject: Bureau of Reclamation's Release of the Draft Finding of No Significant Impact and Final Environmental Assessment for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Comments may be submitted in writing to: Kate Kenninger, Dakotas Area Office, P.O. Box 1017, Bismarck, ND 58502-1017, email kkenninger@ubsr.gov, or by calling 701-221-1282.

Sincerely,

ARDEN FREITAG

Arden Freitag
Area Manager

bc: DK-1000 (Freitag, Hall), DK-2000 (Waters, Fettig), DK-5000 (Kenninger, Reinhart)
(via electronic copy)

WBR:Kenninger:Vinchattle:07/26/2018:701-221-1282
V:\Public\NEPA\Central ND Water Supply\Final EA and FONSI\Public Notice\CNDWS Draft FONSI Final EA_Letter.docx

NORTH DAKOTA
DEPARTMENT of HEALTH

ENVIRONMENTAL HEALTH SECTION
Gold Seal Center, 918 E. Divide Ave.
Bismarck, ND 58501-1947
701.328.5200 (fax)
www.ndhealth.gov

August 3, 2018

Ms. Kate Kenninger
Bureau of Land Management
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

Re: Draft FONSI and Final EA for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central ND Water Supply Project Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties

Dear Ms. Kenninger:

This department has reviewed the information concerning the above-referenced project submitted under date of July 27, 2018, with respect to possible environmental impacts.

This department believes that environmental impacts from the proposed construction will be minor and can be controlled by proper construction methods. With respect to construction, we have the following comments:

1. Care is to be taken during construction activity near any water of the state to minimize adverse effects on a water body. This includes minimal disturbance of stream beds and banks to prevent excess siltation, and the replacement and revegetation of any disturbed area as soon as possible after work has been completed. Caution must also be taken to prevent spills of oil and grease that may reach the receiving water from equipment maintenance, and/or the handling of fuels on the site. Guidelines for minimizing degradation to waterways during construction are attached.

2. Projects disturbing one or more acres are required to have a permit to discharge storm water runoff until the site is stabilized by the reestablishment of vegetation or other permanent cover. Further information on the storm water permit may be obtained from the Department's website or by calling the Division of Water Quality (701-328-5210). Also, cities may impose additional requirements and/or specific best management practices for construction affecting their storm drainage system. Check with the local officials to be sure any local storm water management considerations are addressed.

3. Parts of the proposed construction project overly the Painted Woods Creek glacial drift aquifer, which is a sensitive groundwater area. Care should be taken to avoid spills of any materials that may have an adverse effect on groundwater quality. All spills must be immediately reported to this Department and appropriate remedial actions performed.

The department owns no land in or adjacent to the proposed improvements, nor does it have any projects scheduled in the area. In addition, we believe the proposed activities are consistent with the State Implementation Plan for the Control of Air Pollution for the State of North Dakota.

These comments are based on the information provided about the project in the above-referenced submittal. The U.S. Army Corps of Engineers may require a water quality certification from this department for the project if the project is subject to their Section 404 permitting process. Any additional information which may be required by the U.S. Army Corps of Engineers under the process will be considered by this department in our determination regarding the issuance of such a certification.

If you have any questions regarding our comments, please feel free to contact this office.

Sincerely,

L. David Glatt, P.E., Chief
Environmental Health Section

LDG:cc
Attach.

NORTH DAKOTA
DEPARTMENT of HEALTH

ENVIRONMENTAL HEALTH SECTION
Gold Seal Center, 918 E. Divide Ave.
Bismarck, ND 58501-1947
701.328.5200 (fax)
www.ndhealth.gov

Construction and Environmental Disturbance Requirements

These represent the minimum requirements of the North Dakota Department of Health. They ensure that minimal environmental degradation occurs as a result of construction or related work which has the potential to affect the waters of the State of North Dakota. All projects will be designed and implemented to restrict the losses or disturbances of soil, vegetative cover, and pollutants (chemical or biological) from a site.

Soils

Prevent the erosion of exposed soil surfaces and trapping sediments being transported. Examples include, but are not restricted to, sediment dams or berms, diversion dikes, hay bales as erosion checks, riprap, mesh or burlap blankets to hold soil during construction, and immediately establishing vegetative cover on disturbed areas after construction is completed. Fragile and sensitive areas such as wetlands, riparian zones, delicate flora, or land resources will be protected against compaction, vegetation loss, and unnecessary damage.

Surface Waters

All construction which directly or indirectly impacts aquatic systems will be managed to minimize impacts. All attempts will be made to prevent the contamination of water at construction sites from fuel spillage, lubricants, and chemicals, by following safe storage and handling procedures. Stream bank and stream bed disturbances will be controlled to minimize and/or prevent silt movement, nutrient upsurges, plant dislocation, and any physical, chemical, or biological disruption. The use of pesticides or herbicides in or near these systems is forbidden without approval from this Department.

Fill Material

Any fill material placed below the high water mark must be free of top soils, decomposable materials, and persistent synthetic organic compounds (in toxic concentrations). This includes, but is not limited to, asphalt, tires, treated lumber, and construction debris. The Department may require testing of fill materials. All temporary fills must be removed. Debris and solid wastes will be removed from the site and the impacted areas restored as nearly as possible to the original condition.

North Dakota Department of Transportation

Thomas K. Sorel
Director

Doug Burgum
Governor

August 9, 2018

Arden Freitag
Area Manager
US Department of Interior
P. O. Box 1017
Bismarck, ND 58502-1017

DRAFT FONSI AND FEA FOR ISSUANCE OF WATER SERVICE CONTRACT TO GARRISON DIVERSION CONSERVANCY DISTRICT, MCLEAN COUNTY, NORTH DAKOTA

We have reviewed your July 27, 2018, letter.

This project should have no adverse effect on the North Dakota Department of Transportation highways.

However, if because of this project any work needs to be done on highway right of way, appropriate permits and risk management documents will need to be obtained from the Department of Transportation District Engineer, Jim Redding, Minot at 701-857-6907.

for Roger Weigel
ROBERT A. FODE, P.E., DIRECTOR – OFFICE OF PROJECT DEVELOPMENT

57\raf\js
c: Jim Redding, Minot District Engineer

608 East Boulevard Avenue • Bismarck, North Dakota 58505-0700
Information: 1-855-NDROADS (1-855-637-6237) • FAX: (701) 328-0310 • TTY: 711 • dot.nd.gov

Kenninger, Kate <kkenninger@usbr.gov>

[EXTERNAL] Central North Dakota Water Supply - FONSI

Huibregtse, Jared J. <jjhuibregtse@nd.gov> Wed, Aug 22, 2018 at 2:43 PM
To: "Kenninger, Kate" <kkenninger@usbr.gov>

Good Afternoon Kate,

The State Water Commission has no further comments regarding the Finding of No Significant Impact on the Central North Dakota Water Supply project. Our original comment letter (page A-19 of the FONSI) and USBR's responses (beginning on page B-32 of the FONSI) are sufficient.

Thank you,

-Jared

—

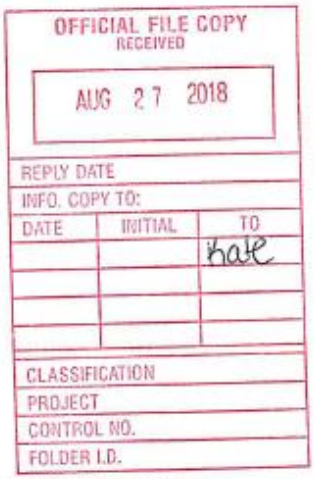
Jared Huibregtse, CFM

Water Resource Planner IV

ND State Water Commission

701-328-4967

2079 48th Ave NE
Fessenden, ND 58438
August 23, 2018



U.S. Bureau of Reclamation
304 E Broadway Ave.
Bismarck, ND 58501

ATT: Arden Freitag

Dear Mr. Freitag,

This testimony is in response to the U.S. Bureau of Reclamation's proposed Central Water Supply Project. Please include my testimony in the official record of the hearing.

I first heard of the proposed project in the local newspaper, *the Wells County Herald Press*. I then went to the official website to get the latest.

I find it almost humorous that the Bureau and other promoters are again trying to move Missouri River water into the Hudson Bay drainage. That has all been tried before. Quite simply stated, it violates the Boundary Waters Treaty of 1909. Since it's been in the courts before, it can be said that case law has already determined it to be illegal on the international basis. The claims that this project will only deliver water to the Missouri drainage simply doesn't hold water---pun intended!

Without the Red River Valley Water Supply Project, the Central Water Supply goes nowhere. Why would anyone want to spend tax payer's money on a pipeline to nowhere?

It can also be said this is just a scam to get Federal money flowing; "I'll pat your back, if you'll pat mine". Whichever project would go forward first, creates a need for the second project. One can't work without the other. They should be viewed as one project together. The segmented approach has also been tried before and failed.

The Bureau has flagrantly failed to prove a NEED for this project. The newspaper article previously mentioned quotes Kevin Cramer as saying "CHS Inc did not move forward with their 3 billion dollar fertilizer plant at Jamestown because of lack of a needed water supply". What about the Jamestown Reservoir? Wasn't that built in part for municipal and industrial water? The claim that CHS needs water is no more than hearsay. Let's see the research that shows CHS cannot get water from the James River or other sources. Or, is it because Bureau water would be a gift, funded by the taxpayers, and to develop the source on their own would simply be more costly? That is NOT a legitimate NEED.

Likewise, I see a letter from the City of Carrington saying they need water. I happen to know that just 2 miles north of Carrington, the NDSU Irrigation Experiment Station sits over quite a large aquifer. Let's see the documented NEED, rather than a letter requesting taxpayer's funded water delivered to their door. The said letter does not demonstrate a NEED. Again, let's look at the city's cost of developing their own water supply project, from the aquifer, against the costs of receiving federally funded water. As in most cases, I'm quite sure the comparisons would be quite revealing, and explain away most, if not all of the support.

Thank you for allowing my comments into the record. Let the record show I CANNOT support this project. I believe it should be stopped.

Sincerely,

Ordean Ebel

Ordean Ebel

cc: Kevin Cramer

August 27, 2018

125 Sussex Drive
Ottawa, Ontario
K1A 0G2

Ms. Kate Kenninger
Dakotas Area Office
Bureau of Reclamation
P.O. Box 1017
Bismarck, North Dakota
58502-1017

Email: kkenninger@usbr.gov

Dear Ms. Kenninger:

On behalf of the Government of Canada, I would like to thank you for the opportunity to provide comments on the Final Environmental Assessment (EA) and Draft Finding of No Significant Impact for the issuance of a water service contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project (CNDWSP).

The Government of Canada's interest in the CNDWSP stems from long-standing concerns about proposed projects in North Dakota to move water from the Missouri River Basin to the Hudson Bay Basin; concerns which we have been noting for years.

The Final EA states that the Proposed Action does not authorize construction to deliver Missouri water into the Hudson Bay basin; the water is for use only in the Missouri River Basin. However, the CNDWSP will connect to the larger Red River Valley Water Supply Project (RRVWSP), and the draft EA specifically states the CNDWSP will utilize the state-sponsored RRVWSP main transmission line to serve Central North Dakota. Therefore, it is inevitable that water will be transferred into the Hudson Bay basin in Canada.

The Government of Canada firmly believes that the CNDWSP is an essential component of the RRVWSP, and as such, it is erroneous to assess environmental and cumulative effects of the CNDWSP in isolation from the broader RRVWSP. We therefore remain concerned about the potential threat of invasive species or harmful biota moving from the Missouri River to the Hudson Bay basin via the inter-basin transfer of water. Canadian aquatic ecosystems could be irreparably compromised once harmful biota is transferred.

The Final EA for the CNDWSP does not consider or assess the cumulative impacts of the Project and provides no indication of measures to mitigate the associated risks. There is no indication of how the environmental impacts of the CNDWSP can be meaningfully separated from the RRVWSP. The well-established *National Environmental Policy Act* requirements for consideration of cumulative impacts have been disregarded, and U.S. federal oversight is required to ensure the fulfillment of obligations under the *Boundary Waters Treaty of 1909*. These state-led projects increase the risk of negative impacts to Canadian waters.

While the state-sponsored RRVWSP will proceed independent of the CNDWSP, given the relation of the CNDWSP to other potential water supply projects in North Dakota, including the connection to the RRVWSP, we remain firmly of the view that cumulative impacts associated with the CNDWSP must be considered. Furthermore, with respect to the Environmental Impact Statement (EIS) for the Federal RRVWSP and Northwest Area Water Supply (NAWS) projects, led by the Bureau, for the NAWS, the U.S. District Court recognized Canada's concerns as valid; noting the risk to water quality and quantity associated with inter-basin transfer should be addressed through strenuous environmental assessments and the implementation of strong mitigation measures. As such, we continue to strongly recommend, and request the Bureau conduct an EIS for the CNDWSP due to its connection to the larger inter-basin RRVWSP and the associated cumulative impacts.

Thank you for the opportunity to provide comments related to the Final EA for the referenced Project.

Yours sincerely,

Eric Walsh
Director General
North America Strategy Bureau

Manitoba
Sustainable Development
Water Stewardship and Biodiversity Division
Box 80-200 Saulteaux Crescent, Winnipeg, Manitoba, Canada R3J 3W3
T 204-945-7008 F 204-945-3125
www.manitoba.ca

August 31, 2018

Ms. Kate Kenninger
Dakotas Area Office
Bureau of Reclamation
P.O. Box 1017
Bismarck, North Dakota 58502-1017
Email: kkenninger@usbr.gov

Dear Ms. Kenninger:

On behalf of the Government of Manitoba, I would like to thank you for the opportunity to provide comments on the Bureau of Reclamation's (BOR or Bureau) draft Finding of No Significant Impact (FONSI) and final Environmental Assessment (EA) for the proposed issuance of water service and power contracts to the Garrison Diversion Conservancy District (GDCD) for the Central North Dakota Water Supply Project (CNDWSP).

Manitoba intends that the present submission be read in conjunction with the Province's September 21, 2017 comments on the original draft EA issued by the Bureau in August 2017, as well as the Province's additional May 17, 2018 comments on the revised draft EA issued by the Bureau in April 2018. Manitoba's previous comments document our long-standing concerns with proposed inter-basin water transfers from the Missouri River Basin to the Hudson Bay Basin in North Dakota, and the associated risks of transferring harmful alien and invasive biota into Manitoba's waters.

It continues to be Manitoba's view that a FONSI for the CNDWSP is inadequate because the Final EA fails to address significant gaps in previous draft EAs. Specifically, the Final EA, including the answers provided by the Bureau in response to the province's previous comments, does not adequately address the real and predictable environmental impacts if Missouri River water provided by the CNDWSP, which will be conveyed by the Red River Valley Water Supply Project (RRVWSP), enters the Hudson Bay Basin without adequate treatment for harmful biota.

The Bureau has previously recognized that an inter-basin transfer between these two watersheds carries significant environmental risks that require analysis and mitigation in the context of the similar Northwest Area Water Supply Project. Despite this, no analysis is undertaken in the final EA of the risks of such a transfer or of the measures that the CNDWSP-RRVWSP will take to mitigate them, and no commitment is made that further analysis will be undertaken in the future.

The Bureau does attempt to ring-fence the CNDWSP from the RRVWSP by maintaining that "NEPA [National Environmental Policy Act] does not dictate that agency review of a federal action encompass non-federal, private activity outside the scope of the geographically limited federal action that is not subject to federal control or permitting."[1] First, as noted in our May comments, Manitoba continues to believe that federal permits will be required for both the McClusky Canal intake and any future RRVWSP intake on the Missouri River. More significantly, the draft FONSI and Final EA also repeat frequently that the "proposed Water Service Contract will include a condition that the water is for use only in the Missouri River Basin."[2] However, the Bureau openly acknowledges that "Reclamation lacks control over where and how RRVWSP water will be delivered,"[3] and it is clear that the in-basin condition cannot be met meaningfully in the case of the CNDWSP-RRVWSP. Missouri River water provided by the CNDWSP will be conveyed exclusively by the RRVWSP main transmission pipeline. There is no suggestion that CNDWSP water will be segregated from other Missouri River water in the RRVWSP pipeline (or how such segregation could be accomplished), and water from whatever intake, including any untreated biota, will be mingled in the pipeline. There is no contemplation of biota treatment and any other measures necessary to monitor, assess, or mitigate the risks of biota spread from an inter-basin transfer, which are left to the state-sponsored RRVWSP. There is only discussion of "flow meter(s) and control valve(s)" to ensure that 20 cfs of water from the RRVWSP remains in the Missouri River Basin.[4] However, biota transfer is a problem of biology and physics; from this standpoint, keeping water "in-basin" on an accounting basis is meaningless, and leaves the Bureau proposing a water quantity solution to a water quality problem.

We also noted the Bureau's response to Manitoba's comments regarding the need for a Corps of Engineers permit under Section 404 of the Clean Water Act. In its comments, the Bureau asserts that "the Canal has an exemption (r) to Section 404 of the Water Pollution Control Act of 1972 (P.L. 92-2500), as amended by the Clean Water Act of 1977 (P.L. 92-217) under sub-Section 404 (r)."[5] However, to qualify for exemption (r) to Section 404, it is a requirement that there be a federal project specifically authorized by Congress, and that an Environmental Impact Statement (EIS) for the project has been submitted to Congress before dredging begins and before the project has federal authorizing legislation as well as federal appropriations.[6] This is a narrow exemption, and its requirements do not appear to be met by the CNDWSP. As there is no facility-specific EIS for the CNDWSP intake, the Bureau appears to rely on the McClusky Canal to trigger the exemption. However, when the Garrison Diversion Unit (GDU), including the McClusky Canal, was authorized by Congress in 1965, as part of the Missouri River Basin Project, there was no EIS performed. Subsequently, environmental impact studies were conducted for the Garrison Diversion Unit after the National Environmental Policy Act (NEPA) took effect in 1970, but these did not precede

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[1] Final EA, B-29.

[2] Draft FONSI EA, 7. Manitoba did note the addition of language limiting water from distribution systems that connect to the Hudson Bay Basin, one pathway for potential biota transfer identified in Manitoba's previous comments.

[3] Final EA, B-28.

[4] Final EA, 2-7.

[5] Final EA, B-30.

[6] As explained by the Council on Environmental Quality in 1980: "In order to satisfy this provision, it is important that the environmental impact statement process be completed before requests for authorizations and appropriations are approved by Congress for federal projects which will involve the discharge of dredged or fill material in waters of the United States, including wetlands, and before actual discharges occur." CEQ Memorandum on Guidance on Applying Section 404(r)(Nov. 17, 1980), available at https://ceq.doe.gov/docs/ceq-regulations-and-guidance/regs/cwa404rguidance.pdf.

authorization and did not include analysis of facilities for municipal, rural, and industrial water supplies. Therefore, no applicable EIS was submitted to Congress, prior to the Garrison Diversion Unit Reformulation Act of 1986 or the Dakota Water Resources Act of 2000, and neither specifically authorized any MR&I intake facility on the McClusky Canal. In short, Congress has not specifically authorized the McClusky Canal or the proposed CNDWSP intake facility with full knowledge of likely environmental impacts, and the requirements for a Section 404(r) exemption appear to be unmet. For that reason, the CNDWSP intake facility will require a Section 404 permit from the Corps of Engineers, and the impact of that construction, as a connected federal action under CEQ regulations, must be addressed in the CNDWSP Environmental Assessment.

Lastly, in response to the Government of Canada's comments on the draft EA, the Bureau goes out of its way to note that "North Dakota's legislature conditioned the RRVWSP funding on environmental regulation compliance, including compliance with the Boundary Waters Treaty (BWT) of 1909."[7] The Bureau seems to acknowledge that the BWT must be honoured, while at the same time effectively delegating treaty compliance obligations to a state government. The state of North Dakota cannot unilaterally determine compliance with a treaty negotiated between our two federal governments. US federal oversight must be maintained to ensure BWT obligations are met. This is especially important over the lifespan of the project, as expanded use within the region and age-related deterioration may exacerbate the risks associated with the proposed inter-basin transfer.

It has been well-established that the consequences of introducing harmful biota from the Missouri River Basin to the Hudson Bay Basin would be irreversible and could be catastrophic for Manitoba's waters and for the communities and people who depend on them. As we have noted in both of our previous submissions regarding the CNDWSP, Manitoba remains deeply concerned that the Bureau, by failing to adequately assess the risks and transboundary implications of the CNDWSP-RRVWSP in their totality, will make itself an accomplice in an unexamined inter-basin transfer and in any subsequent environmental consequences. As outlined above, it is our belief that a FONSI for the CNDWSP is not supported by the final EA, and Manitoba urges the Bureau to address these deficiencies before proceeding further down this path.

Sincerely,

Lori Stevenson
A/Assistant Deputy Minister
Water Stewardship and Biodiversity

c: Rob Olson, Deputy Minister, Sustainable Development
Nicole Armstrong, Director, Water Science and Watershed Management
Elliott Brown, Assistant Deputy Minister, International Relations
International Joint Commission and International Red River Board Co-Chairs

[7] Final EA, B-29.

Missouri Department of NATURAL RESOURCES
dnr.mo.gov
Michael L. Parson, Governor
Carol S. Comer, Director

August 31, 2018

Ms. Kate Kenninger
Bureau of Reclamation
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

RE: Comments on the Final Environmental Assessment for the Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Service Project, North Dakota

Dear Ms. Kenninger:

The Missouri Department of Natural Resources (Department) submits the following comments on the *Final Environmental Assessment for the Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Service Project, North Dakota* (Final EA). As the lead agency for the State of Missouri on water quality and quantity issues, the Department is acutely aware of the significant impacts that water transfers have on the downstream flow of the Missouri River. The Federal government's involvement to deliver water, power, and grant land access for this inter-basin transfer project constitutes a major Federal action and would impact users in Missouri and other downstream states.

For the past thirty years, the State of Missouri has expressed its opposition to Federal out-of-basin transfers of Missouri River water to the Hudson Bay drainage basin. As stated in this Final EA, the purpose of this proposed project is to deliver power, provide water supply, and grant land access to the Garrison Diversion Conservancy District in order to connect to the North Dakota sponsored Red River Valley Water Supply Project (RRVWSP). The State of Missouri will continue to oppose any project that diverts water out of the Missouri River basin, even if a "state sponsored" project. The State of Missouri views this project as essentially a project feature of the larger RRVWSP.

The Bureau of Reclamation (Bureau) in its support of this Project has failed to comply with the National Environmental Policy Act of 1969 (NEPA), 42 U.S.C.A. sections 4321 et seq. Given the implications and impacts to downstream states, this project constitutes a major Federal action that significantly affects the quality of the human environment and thus requires an Environmental Impact Statement (EIS). Upon completion of a Final EIS, the Bureau must then seek Congressional authorization as specified in Section 8 of the Dakota Water Resources Act (DWRA) of 2000 (114 Stat. 2763). Moreover, to fully comply with all the applicable Federal law, any action seeking to deliver water from the Missouri River to the Hudson Bay drainage basin must also fully satisfy the requirements of the Boundary Waters Treaty of 1909. The Bureau has selectively chosen language

within authorizing legislation to provide resources and support to the Garrison Diversion Conservancy District without fulfilling the full Congressional intent of such legislation.

The Bureau did not follow the requirements of NEPA to scope the project and prepare the Final EA. The Bureau incorrectly listed the Department in Appendix D of the Final EA as being a part of the scoping notice contact list. The Bureau did not contact the Department, rather, the Department became aware of this project after discovering that the Bureau was soliciting comments from the public on the Draft EA. Although the Department repeatedly asked the Bureau to include the State of Missouri early in any discussions of DWRA water resource development projects, the Bureau failed to honor this request. This action did not allow the State of Missouri's concerns to be proactively considered during the scoping process.

Purpose and Need

The Purpose and Need section in the Final EA is lacking key information. For example, the Bureau has neither demonstrated the need for the proposed project, nor has the Bureau explained how the twenty (20) cubic feet per second (cfs) specific to this project would be fully consumed within the Missouri River basin. The Final EA also fails to provide alternatives to the proposed project, or analyze the benefits and impacts of the project, which are essential elements of a NEPA review.

The Bureau in its analysis selectively picked a very small project area to consider in an attempt to circumvent Federal requirements for the project. Specifically, the agency only evaluated an intake and a six (6) mile water transmission pipeline. The Bureau's selected project area makes it impossible to justify or ascertain the purpose of, and need for, the project. The Bureau cannot have it both ways, citing the need for Federal power and twenty (20) cfs of water, without taking the responsibility of showing the purpose of the intended water use and associated water distribution system. The Bureau must fulfill the legal requirements of NEPA and other applicable Federal laws, and to date has failed to do so.

Clean Water Act Implications / Section 404

The Bureau has not provided documentation of a Clean Water Act Section 404 permit from the Corps of Engineers to construct an intake on the McClusky Canal or to cross any protected waters of the United States in the project area. The Bureau claims that the McClusky Canal is exempt from Section 404 requirements under subsection 404(r) of the Water Pollution Control Act of 1972 (P.L. 92-2500), as amended by the Clean Water Act of 1977 (P.L. 92-217). However, in order to satisfy the Section 404(r) provision, the appropriate environmental impact documents would need to be completed and submitted to Congress before Congress could approve the necessary authorization and appropriation. (see CEQ November 17, 1980, Guidance on Applying Section 404(r)). The McClusky Canal was constructed in advance of NEPA requirements and therefore, it does not meet the requirements necessary for a Section 404(r) exemption.

Red River Valley Water Supply Project (RRVWSP)

The Bureau is proposing to provide Federal water supply, power supply and grant land access to the RRVWSP, yet the Bureau has refused to provide any information or analysis on this project's role in ultimately implementing the RRVWSP. The Bureau's rationale for not doing so, based on the

agency's responses to previous comments, seems to be that the state sponsored RRVWSP would proceed independently. However, since the proposed project is physically connected to the RRVWSP, the Bureau cannot claim it is "a private activity outside the scope of the geographically limited Federal action." The Bureau is intentionally breaking the project into small components to avoid Federal regulatory oversight or any impact analysis as mandated by NEPA. It is inappropriate for a Federal agency to skirt responsibility of conducting a full environmental impact analysis as required by NEPA and the DWRA.

Cumulative Impacts
The Final EA fails to consider cumulative impacts as required by NEPA (see 40 C.F.R. § 1508.7). A cumulative impact analysis for the proposed project, including an analysis of all past, present, and reasonably foreseeable future actions, is required by NEPA because of the proposed inter-basin transfer of Federal water supply, power supply, and access grant to Federal land for the RRVWSP.

The Missouri River has been substantially depleted by in-basin uses. The River has an average of 7.7 million acre-feet (MAF) of present level depletions (including reservoir evaporation) above Garrison Dam. For comparison, this amount of depletions equals approximately half the average annual volume for the Missouri River at Bismarck, North Dakota. Out of basin water exports harm downstream flow support in times of drought in the Missouri River basin and Missouri River Mainstem Reservoir project purposes (including Federal hydropower generation) are harmed when water exports are allowed. Impacts to the lower Missouri River occur frequently as reservoir levels decrease early in a drought and thus downstream flow support is reduced which, in turn, impacts hydropower generation. A proper cumulative impacts analysis of the project must be conducted through preparation of an Environmental Impact Statement.

Summary
The Bureau's Dakotas Area Office has neglected to conduct an open and complete NEPA evaluation. The State of Missouri urges the Bureau to rescind the Final EA and Draft FONSI, and conduct an open and complete environmental evaluation of the project that fulfills the requirements and obligations of National Environmental Policy Act, the Dakota Water Resources Act of 2000, and the Boundary Water Treaty of 1909.

Should Bureau staff have any questions about the State of Missouri's comments, please contact the Department's General Counsel, Katie Jo Wheeler, at 573-751-0323 or katiejo.wheeler@dnr.mo.gov.

Sincerely,

Carol S. Comer
Director

COALITION TO PROTECT
THE MISSOURI RIVER

August 31, 2018

Ms. Kate Kenninger
Natural Resource Specialist
Bureau of Reclamation
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

Re: Draft Finding of No Significant Impact and Final Environmental Assessment for Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Dear Ms. Kenninger:

The Coalition to Protect the Missouri River (CPMR) appreciates the opportunity to review and comment on the *Draft Finding of No Significant Impact and Final Environmental Assessment for Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota*. The CPMR, established in 2001, represents a broad base of interests throughout the lower Missouri River, including flood control, navigation, agriculture, and public energy and water utilities. We support responsible management of Missouri River resources and maintenance of congressionally authorized purposes of the river, including flood control, navigation, water quality and water supply.

Inter-Basin Transfer of Missouri River Water

The Bureau states on page two that the Central North Dakota Water Supply Project (CNDWSP) will be implemented to deliver *"industrial water that will be used entirely within the Missouri River Basin in North Dakota."* While installation of water meters as referenced in the Final Environmental Assessment (EA) sounds acceptable on paper, we cannot be assured that this project will not contribute to an inter-basin transfer of Missouri River water into the Hudson Bay Basin. Our concern remains that the CDNWSP appears to be part of a larger scheme to divert Missouri River water into another basin by connecting to the Red River Valley Water Supply Project (RRVWSP), of which we have a long history of opposition.

On page seven, the Bureau states: *"The proposed Water Service Contract providing up to 20 cfs of federal water from the Canal will include a condition that the water is for use only in the Missouri River Basin."* There is no provision in the plan to enforce the conditions specified.

Any water taken out of the Missouri River Basin obviously offsets other North Dakota water sources outside the basin. The basis of the contract is specious and the conditions outlined are inherently unenforceable.

Project Need
Twice previously, we have stated our concern regarding the lack of details and demonstrated need for the CNDWSP. Again, the Bureau only lists *"potential industrial activities"* to make its case for 20 cfs of Missouri River water. Without more detail and assurance of industrial prospects, we can only refer to this as a "Field of Dreams" project…if the Bureau provides this diversion from the Missouri River, industry will come. We would be glad to participate in a serious conversation on this topic if the **actual need** could be articulated in regard to the CNDWSP. Until then, the Bureau simply has not made its case for this project.

Limited Scoping and Need for an Environmental Impact Statement (EIS)
Page D-1 incorrectly states that CPMR was contacted during the scoping phase of the CNDWSP. We respectfully ask that this page be revised to omit our organization from the scoping list as we were never contacted about the project. In our October 2017 letter to the Bureau, we stated that CPMR only became aware of this project a few days prior to the original comment deadline.

Further, we noticed that only members of Congress from North Dakota were notified during the scoping phase. This is an egregious omission and raises serious concerns. All members of Congress representing Missouri River Basin and Middle-Mississippi River Basin constituents should have been notified during scoping. Until such time as these members of Congress are given the same opportunity to comment, and their concerns are given equal consideration to the North Dakota delegation, no further action of any kind should be undertaken on this project. The lack of transparency in the development of the CNDWSP is extremely concerning.

We have previously stated our desire for the Bureau to conduct a new and separate EIS for the CNDWSP, and are dismayed by the Bureau's response to this concern on page B-28, which states: *"the range of alternatives an agency must discuss is a matter within the agency's discretion. Reclamation analyzed an appropriate range of alternatives in the EA."* We disagree with the Bureau's analysis that "No Action" and "Proposed Action" are an "appropriate range" of alternatives, and this response further supports our notion that the Bureau is really not interested in input from the public or elected officials that represent the vast majority of Missouri River Basin residents.

To conclude, the inter-basin transfer as proposed by the CNDWSP should be considered a major federal action, requiring an EIS. This project should not move forward until such critical analysis is completed, including: a) a study of the impacts to navigation and other downstream water supply needs; b) a detailed description of how Missouri River Basin water would be managed after it leaves the river to ensure that water is not transferred outside of the basin as the Final EA states; c) incorporation of a a much broader range of alternatives, and d) involvement

of a wider set of stakeholders from the lower Missouri and Middle-Mississippi Rivers with adequate time to respond.

Thank you again for the opportunity to review and comment. Should you have any questions, please do not hesitate to contact me at (573) 690-2324 or danengemann05@gmail.com.

Respectfully,

Dan Engemann
Executive Director

C: The Honorable Chuck Grassley
The Honorable Joni Ernst
The Honorable Kim Reynolds
The Honorable Tom Miller
The Honorable Steve King
The Honorable David Young
The Honorable Dick Durbin
The Honorable Tammy Duckworth
The Honorable Bruce Rauner
The Honorable Lisa Madigan
The Honorable Mike Bost
The Honorable Pat Roberts
The Honorable Jerry Moran
The Honorable Jeff Colyer
The Honorable Derek Schmidt
The Honorable Lynn Jenkins
The Honorable Kevin Yoder
The Honorable Claire McCaskill
The Honorable Roy Blunt
The Honorable Michael Parson
The Honorable Josh Hawley
The Honorable Lacy Clay
The Honorable Emanuel Cleaver
The Honorable Sam Graves
The Honorable Vicky Hartzler
The Honorable Blaine Luetkemeyer
The Honorable Jason Smith

The Honorable Ann Wagner
Ms. Carol Comer, Director, Missouri Dept. of Natural Resources
The Honorable Deb Fischer
The Honorable Ben Sasse
The Honorable Pete Ricketts
The Honorable Doug Peterson
The Honorable Don Bacon
The Honorable Jeff Fortenberry
The Honorable Adrian Smith
Mr. Jeff Fassett, Director, Nebraska Dept. of Natural Resources

RECLAMATION

Managing Water in the West

DK-5000-16-02

Final Environmental Assessment for Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

U.S. Department of the Interior
Bureau of Reclamation
Dakotas Area Office
Bismarck, North Dakota

July 2018

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List of Acronyms and Definitions

Action Area – Based on Reclamation's assessment of the potential direct and indirect effects of the Proposed Action to federally listed species (50 CFR 402.02)

Canal – McClusky Canal

CNDWSP – Central North Dakota Water Supply Project

CEQ – Council of Environmental Quality

CFR – Code of Federal Regulations

CFS – cubic feet per second

Critical Habitat – It is a specific geographic area(s) that is essential for the conservation of a threatened or endangered species and that may require special management and protection.

Connected Actions – Connected actions are those actions that are "closely related" to the proposal and alternatives. Connected actions automatically trigger other actions, they cannot or will not proceed unless other actions have been taken previously or simultaneously, or they are interdependent parts of a larger action and depend on the larger action for their justification (40 CFR Part 1508.25)

DKAO – Dakotas Area Office

Environmental Mitigation Commitments – These are commitments included as an inseparable component of this Proposed Action. They are designed to offset potential for significant environmental effects resulting from the Proposed Action. These commitments will be implemented to (1) prevent, minimize, or offset the occurrence of potential for adverse environmental effects and (2) ensure compliance with applicable Federal and State regulations designed to protect fish and wildlife resources, important habitats and sensitive areas, cultural and paleontological resources, human health and safety, and the public interest.

EA – Environmental Assessment

EIS – Environmental Impact Statement

ESA – Endangered Species Act of 1973

FONSI – Finding of No Significant Impact, the document briefly presenting the reasons why an action will not have a significant effect on the human environment and for which an environmental impact statement therefore will not be prepared (40 CFR Part 1508.13)

Garrison Diversion – Garrison Diversion Conservancy District

GDU – Garrison Diversion Unit

IPaC – Information, Planning, and Conservation System

ITA – Indian Trust Assets

MM – Mile Marker

MR&I – Municipal, Rural and Industrial (water supply)

NDSHPO – North Dakota State Historic Preservation Officer

NEPA – National Environmental Policy Act of 1969 as amended

NHPA – National Historic Preservation Act of 1966 as amended

NRCS – Natural Resources Conservation Service

NRHP – National Register of Historic Places

O&M – Operations and Maintenance

Project Area – The Central North Dakota Water Supply Project facility location, including the pump station, six miles of pipeline, and ten miles of electrical facilities.

Proposed Project – The subject of this EA, the proposal to issue water service contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project

Program - Pick-Sloan Missouri Basin Program

Reclamation – U.S. Department of the Interior, Bureau of Reclamation

ROW – Right-of-Way

SUP – Special Use Permit

USACE – U.S. Army Corps of Engineers

USDA – U.S. Department of Agriculture

USFWS – U.S. Fish and Wildlife Service

Chapter 1 Introduction and Regulatory Background

Introduction

The Bureau of Reclamation (Reclamation) is proposing to issue a water service contract, special use permit (SUP), and approve authorization of a preference power contract to Garrison Diversion Conservancy District (Garrison Diversion) for the Central North Dakota Water Supply Project (CNDWSP) (Proposed Action). Garrison Diversion has requested a water service contract and preference power to withdraw up to 20 cubic feet per second (cfs) of water from the McClusky Canal (Canal) to serve areas of Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties within the Missouri River Basin, North Dakota. CNDWSP would utilize the state-sponsored Red River Valley Water Supply Project (RRVWSP) main transmission line to serve Central North Dakota. Additionally, Garrison Diversion has requested a SUP from Reclamation to construct an intake in the Canal, a pump station building, and approximately 0.10 mile of pipeline on Reclamation's right-of-way on the Canal.

Reclamation has prepared this Revised Draft Environmental Assessment (EA) in response to substantive comments on environmental issues in the Draft EA release for public comment in August 2017 (Appendix A). Comments were received from state and federal agencies and other organizations interested in the Proposed Action. Some changes were incorporated into the Revised Draft EA in response to the comments received, but these revisions do not fundamentally change the impact analysis or the results presented in the EA. The primary changes from the Draft EA include:

- Purpose and Need Discussion – provided additional information to clarify the need for the Proposed Action
- Connected Action Discussion – provided additional information for clarification
- Geographic Scope and related Cumulative Impact Analysis – provided additional information for clarification
- Compliance with the 1909 Boundary Waters Treaty – included a discussion of the infrastructure/controls included to keep Missouri River water for the Proposed Action within the Missouri River Basin
- In response to comments regarding impacts from Missouri River depletions, Reclamation expanded the discussion of the Missouri River Mainstem System to describe its extent, to explain how the U.S. Army Corps of Engineers (USACE) operates this integrated system of dams and reservoirs and discloses the analysis of potential effect which utilized the results of the most recently completed comprehensive analysis of Missouri River depletions.

Garrison Diversion was made a cooperating agency in the revised draft EA process due to their expertise on the CNDWSP information and data necessary to complete revisions. A revised Draft EA was released in April 2018. Comments on the revised Draft EA and Reclamation's response to comments are located in Appendix B.

Purpose and Need for the Proposed Action

Garrison Diversion has requested Reclamation water from the Canal and Pick-Sloan Missouri Basin Program preference power for the CNDWSP.

Garrison Diversion's request for a water service contract and preference power are in response to continued growth and industrial development in the region and the need for a reliable water source. Reclamation evaluated the Central North Dakota User Nomination Process Report completed for Garrison Diversion (AE2S and Black & Veatch 2017) highlighting current water uses, State Water Commission permit allocations and projected water use into 2075 for communities that have interest in use of the Proposed Project. Based on those water projections into 2075, water permit allocations would cover domestic demands but not the industrial nominations requested by the communities (Table 1).

Plant genetics as well as changes in climate have allowed farmers to grow traditional row crows (e.g. corn, soybeans) in areas where they could not before in North Dakota. Changing crop patterns suggest that future ag-processing activities would likely trend toward row crops. Row crop processing is generally more water intensive than processing of small grains (Bangsund and Leistritz 2004). As a result, water demand from ag-processing has the potential to grow in the future. Additionally, in 2015, CHS, Inc., a farmer-owned cooperative, did not move forward with a $3 billion fertilizer plant in Jamestown, North Dakota, in part due to lack of a needed water supply (Norman 2015). Water quantity reliability (the amount of water available on a consistent basis) is a controlling factor in the planning of water-intensive industrial supply projects.

The purpose of the Proposed Action is to consider the eligibility of Garrison Diversion to receive Pick-Sloan Missouri Basin Program (Program) preference power and a water service contract for 20 cfs from the Canal as an alternative source for the portion of the Proposed Project that would utilize water within the Missouri River Basin. A reliable MR&I water supply is requested by Stutsman Rural Water District, Jamestown, Carrington, Central Plains Water District, Tuttle, and South Central Regional Water District Water District for industrial water that would remain within the Missouri River Basin, North Dakota.

The Proposed Action is needed to fulfill the purposes of the Garrison Diversion Unit Act of August 5, 1965 (79 Stat. 433) to provide municipal and industrial water, among other purposes, and the Garrison Diversion Unit Reformulation Act of 1986 (100 Stat. 418), as amended by the Dakota Water Resources Act of December 21, 2000 (114 Stat. 2763) to meet the water needs of the State of North Dakota, including MR&I water needs. Garrison Diversion is designing and constructing the state-sponsored RRVWSP, which will use an intake directly on the Missouri River as a water source, but has requested 20 cfs from the Canal, the Proposed Action, as a lower cost option for a portion of the water that would be supplied for industrial purposes for Stutsman Rural Water District, Jamestown, Carrington, Central Plains Water District, Tuttle and South Central Regional Water District. These communities determined their projected industrial growth water needs will exceed the existing State Water Commission groundwater permits. Therefore, available industrial water allocations have the potential to limit future industrial development within the region.

Federal Decisions to Be Made

This EA provides analysis to inform four primary federal decisions:

- Approve, approve with conditions, or deny all or in part Garrison Diversion's request for a Water Service Contract providing up to 20 cfs of federal water from the Canal for use in the Missouri River Basin as part of the CNDWSP.
- Approve, approve with conditions, or deny all or in part Garrison Diversion's request for eligibility to receive P-SMBP preference power for the CNDWSP.
- Approve, approve with conditions, or deny all or in part Garrison Diversion's request for a use authorization to construct and maintain facilities on Reclamation land and provide for regular and emergency maintenance access.
- Approve, approve with conditions, or deny all or in part a use authorization to the utility company for installation of powerlines on Reclamation land for providing power to Garrison Diversion's pump station.

Table 1. Central North Dakota Water Supply Nomination Information (AE2S and Black & Veatch 2017, North Dakota State Water Commission 2015).

Prospective Users	Current Water Source	Permit Number	Permit Allocation	2016 Water Use	2075 Water Demand Projections (cfs)	Potential Industrial Activities [cfs]	Industrial Nomination (cfs)
Jamestown	Groundwater	1120	10.56	5.25	8.35	Nitrogen fertilizer production [12.22]; Beef processing [2.91]; Biodiesel production (soybean) [1.17]; Soybean crushing/cracking [1.16]; Ethanol, fuel grade-corn (expansion) [1.12]	15.0
	Surface water	6085*	2.92	0.00			
	Groundwater	6597*	0.96	0.26			
Stutsman Rural Water District	Groundwater	3774	0.45	0.28	0.57		
	Groundwater	5690	0.45	0.28			
	Groundwater	6454*	2.23	0.79			
	Groundwater	6609*	2.11	0.00			
Carrington	Groundwater	1113	0.85	0.34	0.73**	Biodiesel production (soybean) [1.17]; Soybean crushing/cracking [1.16]; Ethanol, barley [1.41]; Beef processing [0.73]; Oilseeds [0.30]	2.5
Central Plains Water District	Groundwater	3811	0.28	0.00	0.90	Potato [0.50]; Ethanol [0.48]; Oilseeds [0.24]	0.6
	Groundwater	4091	0.41	0.29			
	Groundwater	5222	0.21	0.22			
South Central Regional Water District	Groundwater	4679	0.44	0.33	3.0 – 4.0	Potato [0.50]; Ethanol [0.48]; Oilseeds [0.24]	0.5
	Groundwater	5792	2.21	1.76			
	Groundwater	6019	1.93	0.78			
Tuttle	Groundwater	2142	0.07	0.01	0.03	Sunflower [0.009]; Chicken processing [0.04]; Potato [0.08]	0.02

*industrial permit **maximum projected 2075 domestic demand and current water sales

Project Area

The Canal is located in McLean, Burleigh, and Sheridan Counties, North Dakota, originating at Audubon Lake in Section 11, Township 147 North, Range 82 West, McLean County and extends 73.6 miles east terminating in Section 25, Township 149 North, Range 76 West, Sheridan County. Water is pumped from Lake Sakakawea into Audubon Lake and flows by gravity through the Canal. The Canal was designed to convey 1,950 cfs of water for municipal and rural water systems and irrigation. The design features include 2:1 slopes with a 25-foot bottom width, 17-foot water depth, and 94-foot water surface width. The Canal also provides recreation opportunities and wildlife habitat.

The Project Area is located approximately 12 miles southwest of McClusky, North Dakota near mile marker (MM) 42.5 of the Canal (Figure 1). A pipeline with a diameter of up to 36-inch diameter would extend approximately 6 miles south from a proposed pump station and tie into the state-sponsored RRVWSP main transmission line, which travels west to east and will be utilized to serve water to both the Red River Valley and the Central North Dakota Area (Figure 2).

The proposed pump station building and pipeline would occur within a 150-foot right-of-way. The Project Area would be located primarily in an agricultural area, located in:

Township (T) 145 North (N), Range (R) 77 West (W), Section 32
T144N, R78W, Section 1, 11, 12, 14, 23, 24, 25, 26, 35

The Project Area is located in the Great Plains (level I ecoregion), West-Central Semi-Arid Prairies (level II ecoregion), Northwestern Glaciated Plains (level III ecoregion), and Missouri Coteau Slope (level IV ecoregion). The Northwestern Glaciated Plains marks the western extent of continental glaciation and contains significant surface irregularity. The ecoregion contains a high concentration of wetlands and land uses that consist mainly of farming and cattle ranching. Precipitation averages 17.7 inches annually. The average annual low temperature is in January, 18.3 ºF, while July has the highest average temperature, 83.5 ºF (NOAA 2002).

Geographic Scope

For the cumulative impact analysis, in addition to the Project Area, Reclamation is evaluating a geographic scope that includes a portion of the state-sponsored RRVWSP and tie-in that would occur in the proposed 150-foot ROW of the CNDWSP (Figure 3).

Authority

Reclamation is authorized to issue a water service contract and to determine project eligibility to receive Pick-Sloan preference power under the Act of June 17, 1902 (32 Stat. 388) and acts amendatory of or supplementary to that Act, particularly the Reclamation Project Act of 1939 (53 Stat. 1187), as amended, the Flood Control Act of 1944 (Pub. L. 78-534; 57 Stat. 887), and the Garrison Diversion Unit Act of August 5, 1965 (79 Stat. 433), as amended and supplemented by: Title II of the Energy and Water Development Appropriation Act of July 16, 1984 (98 Stat. 403); the Garrison Diversion Unit Reformulation Act of May 12, 1986 (100 Stat. 418); and the Dakota Water Resources Act of December 21, 2000 (114 Stat. 2763). Section 9 of the Flood

Control Act of 1944, as amended, authorizes the Program for eight purposes: flood control, navigation, irrigation, power, water supply, recreation, fish and wildlife, and water quality.

Development of a water service/repayment contract would be initiated after the completion of the National Environmental Policy Act (NEPA) documentation. The timeframe for the water service contract would be 40 years and the timeframe for the SUP would be 25 years.

Reclamation is charged with the responsibility to administer and regulate water and power services, rates, and charges for the use of Reclamation facilities through federal contracts. The CNDWSP would be constructed with funds in whole or in part by the local users and the State of North Dakota.

National Environmental Policy Act Process

Reclamation is the lead federal agency for the Proposed Action. Therefore, Reclamation is ultimately responsible for compliance with NEPA of 1969 (as amended). To comply with NEPA and related environmental laws and regulations, federal agencies must consider the potential environmental effects of their decisions regarding approval of projects proposed on federally-owned and administered land or projects under federal control. Reclamation must evaluate connected actions as required in the Council of Environmental Quality (CEQ) 40 Code of Federal Regulations (CFR) 1508.25. This evaluation may include assessing cumulative impacts on non-federally managed lands.

There are no connected actions requiring additional analysis in this EA. As defined in 40 CFR 1508.25, actions are connected if they: 1. Automatically trigger other actions which may require environmental impacts statements; 2. Cannot or will not proceed unless other actions are taken previously or simultaneously; or 3. Are interdependent parts of a larger action and depend on the larger action for their justification. 40 C.F.R. § 1508.25(a)(1). NEPA procedural protections apply to "major Federal actions significantly affecting the quality of the human environment...." 42 U.S.C. § 4332(c). The focus of 40 C.F.R. § 1508.25(a)(1) is to ensure that a federal project is not improperly segmented to avoid compliance with NEPA. The state-sponsored RRVWSP will proceed independent of the proposed CNDWSP and does not need approvals from Reclamation. Garrison Diversion would utilize the state-sponsored RRVWSP to deliver the proposed 20 cfs of federal water. The state agreed to limit distribution of the 20 cfs to the identified in-basin communities in need.

This EA documents the proposed federal action, alternative actions considered, expected impacts of those actions, and compliance with environmental laws and regulations. The 516 DM 14.4 and 516 DM 14.4B recognizes that Reclamation may choose to not initially prepare an EIS and in those instances requires that an EA be prepared and handled in accordance with 40 CFR 1501.4(e)(2). The 516 DM also provides a categorical exclusion D(4) for water service contract actions that are for minor amounts of long-term water use or temporary or interim water uses where the action does not lead to long-term changes and where the impacts are expected to be localized. Reclamation determined the NEPA analysis will commence with an EA.

This EA may lead to a Finding of No Significant Impact (FONSI) if the responsible official decides the impacts of the action are not significant. If significant environmental impacts are identified, Reclamation would stop the EA process and may proceed with the preparation of an

EIS. Reclamation defines significance in accordance with 40 CFR 1508.27 in reference to context and intensity.

If there are substantial changes in the Proposed Action; new circumstances or information relevant to environmental concerns and bearing on the Proposed Action or its impacts; or delays in implementing the action, it may be necessary for Reclamation to conduct additional environmental review.

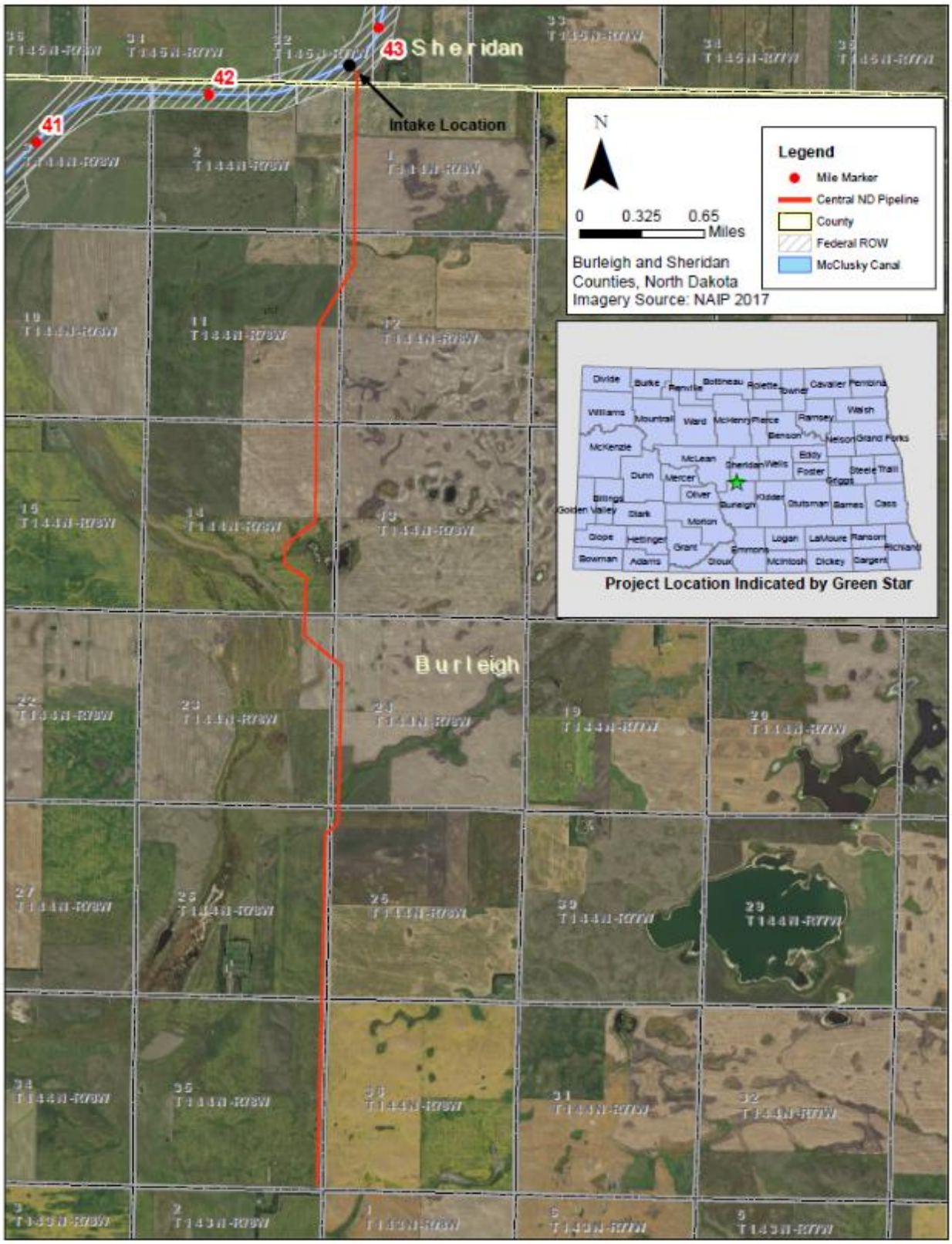

Figure 1. Overview of the Project Area for the Proposed Central North Dakota Water Supply Project.

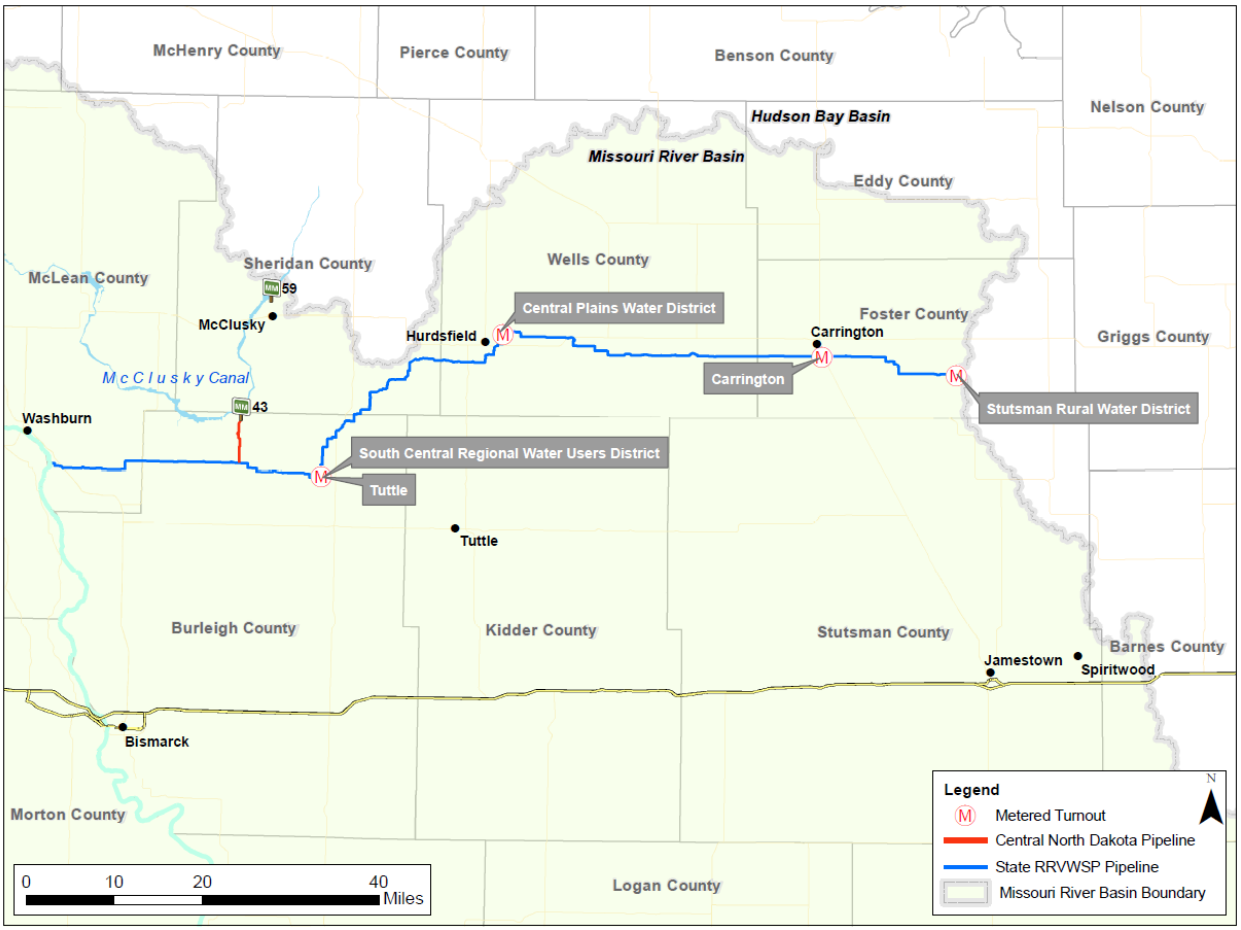

Figure 2. Overview of the Proposed Central North Dakota Pipeline Project and the State-sponsored Red River Valley Water Supply Project.

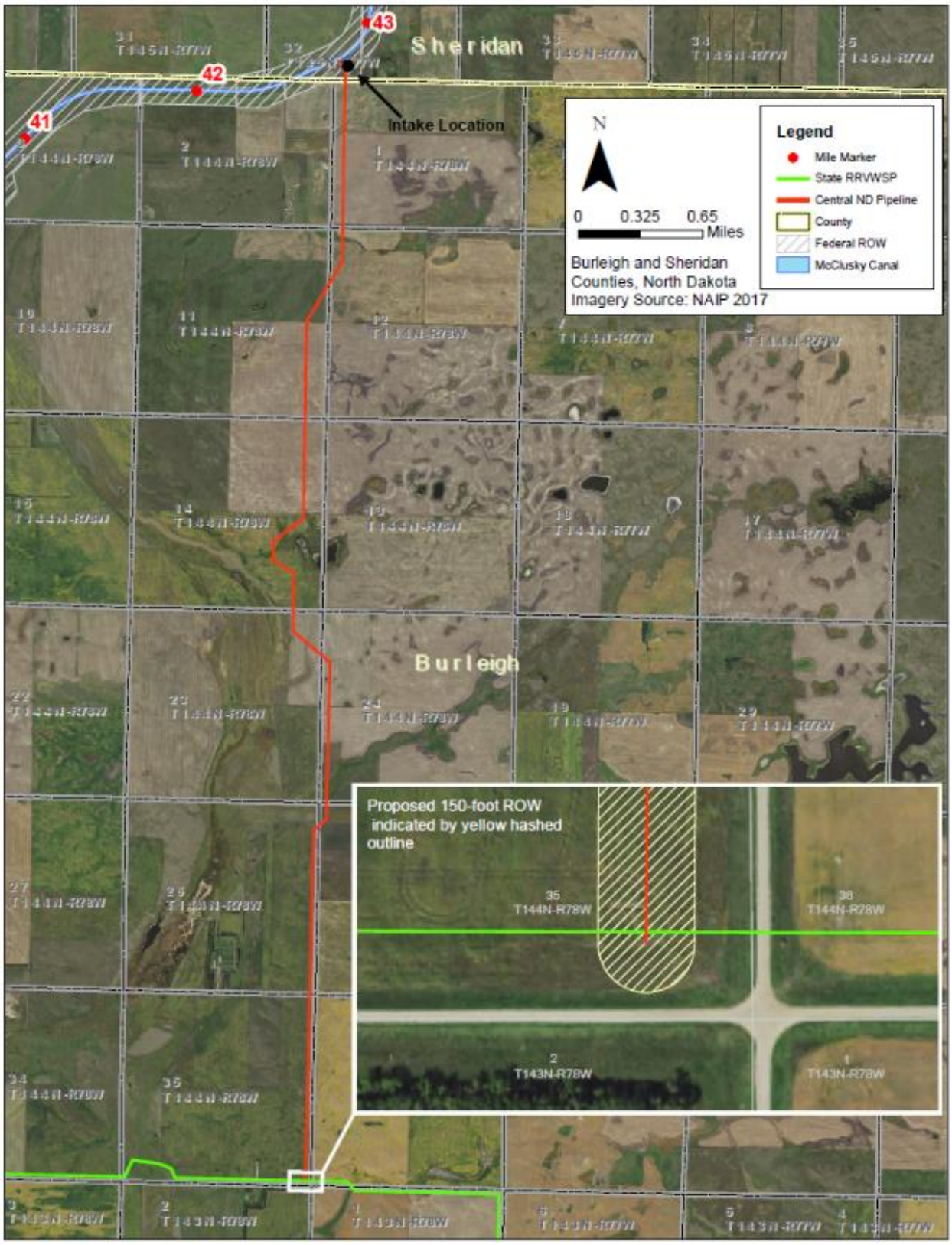

Figure 3. Geographic Scope of the Proposed Central North Dakota Pipeline Project.

Chapter 2 Proposed Action and Alternatives Considered

No Action Alternative

The No Action Alternative consists of the future without the proposed federal action – Reclamation would not issue a water service contract or SUP to Garrison Diversion for the CNDWSP. The CNDWSP would not be eligible to receive Pick-Sloan Missouri Basin Program preference power. Garrison Diversion would utilize the state-sponsored RRVWSP as a means to convey MR&I water to Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties, North Dakota. Under this alternative the state-sponsored RRVWSP would withdraw 165 cfs of water from the Missouri River, to obtain the full water supply, including 20 cfs for the CNDSWP and 145 for the state-sponsored RRVWSP. The No Action Alternative would not require a water service contract or SUP from Reclamation.

Proposed Action - Central North Dakota Water Supply Project

The Proposed Action, Reclamation's preferred alternative, is to issue a water service contract and SUP to Garrison Diversion, and approve authorization of a preference power contract, to make available GDU project water, preference power, and certain Reclamation lands to the CNDWSP. CNDWSP is being planned to deliver a MR&I water supply to Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties for use within the Missouri River Basin of North Dakota. The Proposed Action includes:

1. Reclamation would issue a long-term (40 years) water service contract to Garrison Diversion, making up to 20 cfs (approximately 14,489 acre feet per year) of federal water available from the Canal for the CNDWSP.
    a. The proposed water service contract would utilize approximately 1.2% of the water appropriated to Reclamation from the North Dakota State Water Commission, under Permit No. 1416 for 1,212,348 acre-feet from the Missouri River for MR&I and other authorized purposes. The priority date of this water permit is February 9, 1967. The maximum amount of water allocated under this permit is based on beneficial use as defined by the state of North Dakota water law.

2. Reclamation would determine project eligibility for P-SMBP preference power to Garrison Diversion for the CNDWSP.

3. Reclamation would issue a SUP (25 years) to Garrison Diversion to construct and maintain the facilities required on Reclamation land (as described below) and provide for regular and emergency maintenance access. Facilities include an intake in the Canal, wet well, pump station, and approximately 0.10 miles of the 6 mile of pipeline.

4. Reclamation would issue a SUP to the utility company for installation of power lines on or across Reclamation land to power the pump station.

5. The Proposed Action also includes 6 miles of the pipeline for delivery of up to 20 cfs from the Canal to the state-sponsored RRVWSP. This component of the Proposed Action does not require Reclamation approval, however it is dependent upon Reclamation's approval of a water service contract and SUP as described above thus is analyzed in this EA as part of the Proposed Action.

Issuing Water Service Contracts and Determining Project Eligibility for Pick-Sloan Missouri Basin Program Preference Power

Subsection 9(c)(2) of the 1939 Act allows the Secretary of the Interior to enter into water service contracts for the recovery of reimbursable costs allocated to M&I or other miscellaneous purposes. Contracts executed pursuant to subsection 9(c)(2) of the 1939 Act are limited to a maximum of 40 years.

The water service contracting process is as follows:

- Identify contract action (i.e. is water is available, which contract instruments are available, etc.)
- Determine Reclamation's authority to execute contract;
- Execute Memorandum of Understanding for reimbursement of environmental compliance and contractual documents.
- Seek delegation of authority, if necessary, through the Basis of Negotiation and approval process;
- Draft Contract;
- Obtain legal sufficiency;
- Technical and/or negotiation discussions, if necessary;
- Public review and participation;
- Environmental compliance;
- Contract review, execution, distribution, and court confirmation, if necessary

Through specific contract articles, Reclamation will ensure Garrison Diversion's responsibilities for the operation, maintenance, and replacement of the distribution and management of water deliveries and implementation and monitoring of environmental commitments are satisfied.

If a water service contract is issued for the project, conditions of the contract would include maintaining use of the proposed 20 cfs in the Missouri River Basin (controls and metering are discussed further in Operations under Proposed Action).

The authorization of a preference power contract process is as follows:

- Determine if the project is eligible for project use power;
- Coordinate power contract development and administration with Western Area Power Administration

Major Components of the Proposed Action Alternative

McClusky Canal Intake

The CNDWSP intake would include screens, wet well, and a pump station to lift water from the Canal to the CNDWSP pipeline near MM 42.5. Figure 4 depicts an overview of the proposed facilities. To construct the intake structure, two temporary earthen dikes would be placed in the

canal approximately 100 feet upstream and downstream of the intake structure location. The section between the two earthen dikes would be dewatered throughout the construction process, allowing for the installation of the intake and wet well.

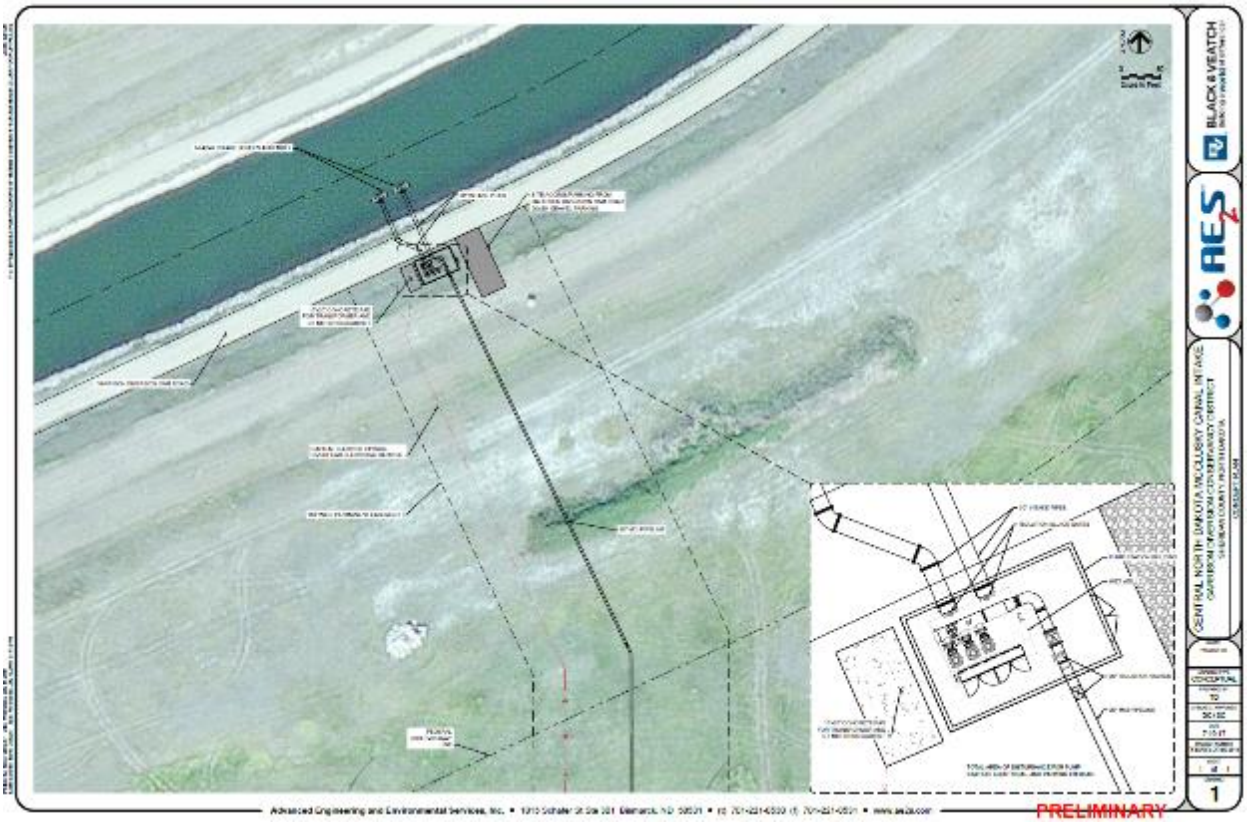

Figure 4. Overview of the Proposed McClusky Canal Intake Facilities.

Figure 5. Dual Johnson 54" x 42" Tee Screens.

Screen: The planned intake screen would be installed in the Canal to withdraw water for the CNDWSP. The project plans to construct something similar to the Dual Johnson 54" x 42" Tee screens as shown in Figure 5. Per the North Dakota Game and Fish guidelines, the intake screens would be manufactured using mesh spaced 0.25" or less. If the intake is placed at least 20 vertical feet below the existing water level, the intake velocities would not exceed 0.5 foot/second. If the 20 vertical feet below water level cannot be achieved, the intake velocity would be limited to 0.25 foot per second, with the intake placed at a maximum practical attainable depth. The installation of the intake screens would require a concrete anchor pad for support, concrete cribbing for protection, and an air pipe connection for screen cleaning. Garrison Diversion plans to utilize a minimum submergence of four feet from the top of the screen to the average water surface elevation.

Wet Well and Anchor Pads: Water would enter through the screens and be delivered to a wet well before it is pumped out into the pipeline. This facility would require the construction of a concrete rectangular wet well and anchor pads. The planned wet well building has interior dimensions of approximately 12' x 16' (example of planned construction shown in Figure 6).

Figure 6. Example of Wet Well and Anchor Pads.

Pump Station: A pump station would be required to house the mechanical equipment. This component of the Proposed Action includes a 20' x 30' building constructed over the wet well.

Due to the sloped terrain at the proposed location, an estimated 5,000 square foot area would be graded. The planned facility includes a graveled area approximately 20' x 50' next to the pump station building for parking vehicles and equipment. The pump station would be constructed of concrete walls and beams supporting a precast roof. Heating and cooling would be provided for the pump station along with extra cooling capabilities, which may be needed due to the heat generated by the large horsepower pumps. The building would also include an electrical/control room.

The pump system housed inside the pump station would have capacity for a design flow of approximately 20 cfs (8,976 gpm). Three 4,500 gpm capacity vertical turbine pumps would be installed, each with a variable frequency drive to allow adjustments in flow. Each pump discharge would be connected to the discharge piping, a check valve, air release mechanism, and isolation valve before connecting to a common discharge manifold. The discharge manifold and piping would exit the structure below grade and connect to a water supply pipeline.

Pipeline

The water supply pipeline includes the construction of a buried pipeline extending approximately 6 miles from the pump station and delivers water to the RRVWSP main transmission pipeline. The CNDWSP pipeline is designed to be up to 36-inch diameter to maintain an estimated velocity of approximately 4 feet/second. The water supply line would be installed using open cut construction methods typical of pipeline construction in North Dakota. An isolation valve would be constructed at the pump station and at the tie-in of the water supply line to the RRVWSP main transmission pipeline to allow for control of water flow at both of those locations. The pipeline design includes gasketed joints with restrained joints being used at all horizontal and vertical deflections for thrust restraint. Vacuum/air release valves would be located at high points along the alignment and blow-off valves would be located at low points for draining of the pipeline.

The pipeline would be constructed within private utility easements obtained by the Garrison Diversion and they would be responsible for completing topographic and boundary survey on each individual parcel. Easement monumentation would be set in accordance with North Dakota Century Code requirements and during construction, easement boundaries and the pipe centerline would be temporarily staked at 100-foot intervals. Within the easement limits, topsoil would be cleared, separated, and stockpiled on one side of the easement. All vegetation would be removed and disposed of offsite.

Trenching would be performed in accordance with applicable OSHA and State of North Dakota regulations. Excavated material would be kept separated from the topsoil. Granular materials would be used for pipe bedding. The pipeline would generally have 7.5 feet of cover over the top of the pipe and follow the general contour of the land being crossed. Native excavated material would be used for backfill where suitable. Backfill would be re-compacted to a minimum of 90% standard proctor per ASTM D698. Excess backfill material would be removed from the project right-of-way. Finally, all stockpiled topsoil would be spread over the easement to bring the ground back to the pre-construction elevations and contours. Native prairie grasses or other suitable vegetation would then be seeded to prevent erosion and weed growth.

Electrical Line

A proposed electrical line would connect the pumping station to the Capital Electric Erickson substation approximately 14 miles southwest of the intake. The proposed electrical alignment is approximately 10 miles, approximate location shown in Figure 7. This alignment is subject to change based upon Capital Electric's routing requirements. Three-phase overhead power would be run on standard height utility poles by Capital Electric along existing public rights-of-way (ROW) in an approximate 10-foot ROW and then adjacent to the access drive into the site. A pad mounted, 2,000 KVA transformer and secondary termination cabinet would then be placed adjacent to the proposed pumping station. The concrete pad for the transformer and CT metering cabinet would be approximately 10'x20'.

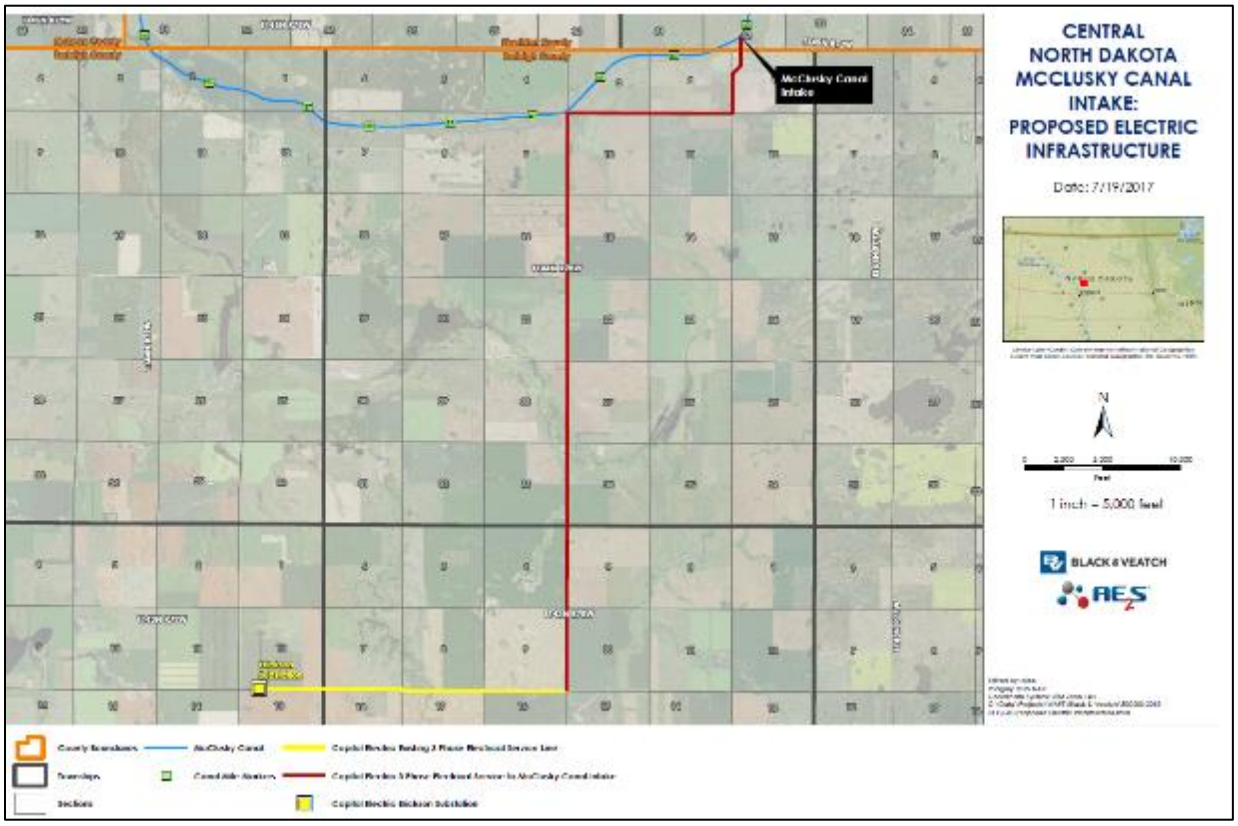

Figure 7. Proposed Electrical Facilities.

Construction Timing

Following standard construction practices of similar type project, earthwork for the construction of the Proposed Action would occur in the spring after spring thaw and continue to freeze up (approximately November). Guidance provided by the North Dakota Game and Fish Department recommends work not take place in the Canal from April 15 to June 1.

Operation

Water would be conveyed in this pipeline south of the intake approximately 6 miles (Figures 1 and 2) where it would tie into the state-sponsored RRVWSP. All of the water withdrawn from the Canal would be metered and the flow would be regulated using a SCADA system. The amount withdrawn and delivered to the state-sponsored RRVWSP for conveyance would not

exceed the combined demands of project users within the Missouri River basin, up to a maximum of 20 cfs.

The Canal intake pump station would include Variable Frequency Drives on each pump to allow the withdrawal rate to be adjusted based on the amount needed for deliveries. At the delivery point for each user, a flow meter and control valve would be utilized to monitor and regulate the flow leaving the main RRVWSP pipeline. Using these features for the project, the Proposed Action would not withdraw any more water from the Canal than what would actually be needed by the CNDWSP users in the Missouri River Basin.

Water requested for the Proposed Project would be provided through a separate connection for industrial water, there would be no direct link to the community distribution systems.

Garrison Diversion would be responsible for the operation and maintenance of the distribution and management of water deliveries and implementation and monitoring of environmental commitments, these requirements would be explained in detail in the water service contract issues for the Proposed Action Alternative.

Other Projects within Geographic Scope

A portion of the state-sponsored RRVWSP occurs within the Geographic Scope of this EA.

State-sponsored RRVWSP

The state of North Dakota plans to use state and local funding to construct, operate and maintain the state-sponsored RRVWSP. This project will provide a supplemental water source for central and eastern counties in North Dakota during times of water scarcity to protect public health, ensure ongoing economic vitality, and provide for environmental benefits in the river systems (http://www.rrvwsp.com/about/). The state-sponsored RRVWSP also provides opportunities for industrial growth in the region, which is currently limited due to available water sources. The state-sponsored RRVWSP is being planned and coordinated by Garrison Diversion. Current plans include the following major components:

- Construction of an intake on the Missouri River to provide up to 165 cfs from the Missouri River for water supply in central and eastern North Dakota.
- Construction of a 72-inch to 78-inch buried Main Transmission pipeline and associated appurtenances, which will provide bulk water service to CNDWSP users in the Missouri River Basin, and transport remaining water across the continental divide into the Hudson Bay Basin for use in the Red River Valley.
- Construction of Pipeline support facilities such as pump stations, break tank &hydraulic structures and associated pipeline.
- Construction of a treatment facility.
- Construction of a discharge structure.

The state-sponsored RRVWSP is an independent project that will be completed solely by the state, without approvals or involvement of Reclamation. The RRVWSP was first initiated as a federal project authorized under the Dakota Water Resources Act of 2000, which mandated the preparation of an EIS. The EIS was completed in 2007 but a Record of Decision was never

signed for a federally authorized project and there is no current or foreseeable federal proposal. Since federal authorization for the project was never finalized, the State of North Dakota, communities, and local users are pursuing a separate, but similar state-sponsored RRVWSP independently. The State of North Dakota authorized up to $30 million for the 2017-2019 biennium to complete design and initiate construction of portion of the state-sponsored RRVWSP. The state-sponsored RRVWSP is being funded by the state, communities, and local water users. No federal authorization or funding is being requested from Reclamation for the state-sponsored RRVWSP.

For the cumulative impact analysis, Reclamation will analyze the tie-in and portion of the RRVWSP that would occur within the proposed 150-foot ROW of the CNDWSP (Figure 3).

Other Projects

There are other existing and planned projects in general close proximity to the proposed CNDSWP (Figure 8).

McClusky Canal Slide Repairs

NEPA analysis was completed and a FONSI signed by Reclamation on May 9, 2017 for the Canal slide repair project. The slide repairs will occur upstream of the proposed CND Project to repair portions of the canal which have slumped in. The project is planned to extend from Mile Marker 20 to Mile Marker 22. Repair work is planned to occur over the course of five to six years.

Local Irrigation Projects

Garrison Diversion currently has a water service contract and power service contract with Reclamation for the Turtle Lake and McClusky Canal irrigation projects near the Project Area. The plan for the 2018 season includes the following projects:

- MM 42 Right – irrigate 75 acres at a maximum of 325 gallons per minute (0.72 cfs);
- MM 42 Left – irrigate 1,395 acres at a maximum of 8,100 gpm (18 cfs) (Reclamation 2011; Reclamation 2018).

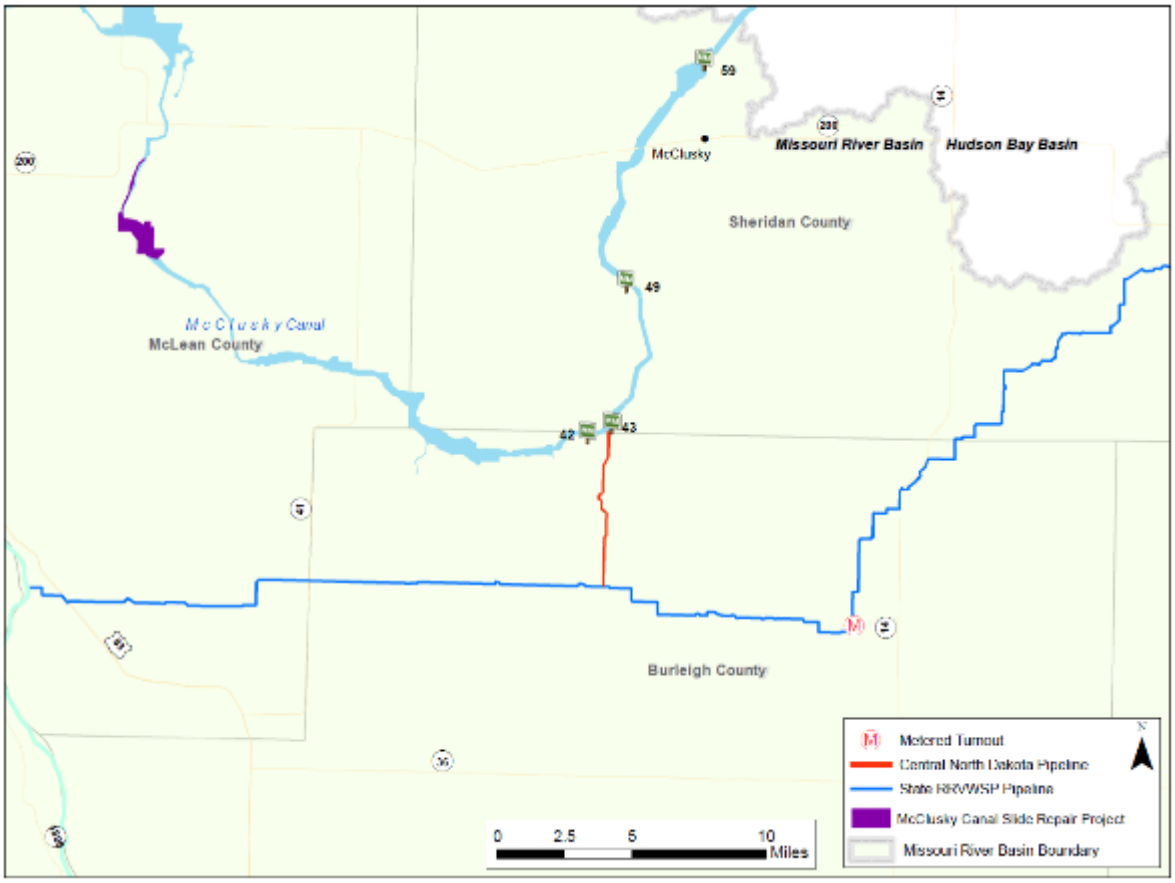

Figure 8. Other Projects in Proximity to the Proposed Central North Dakota Water Supply Project.

Environmental Commitments

The Proposed Action includes the following environmental commitments (Table 2). These commitments have been developed in consultation with Federal and State agencies, the Tribes, and the public in response to construction activities and scoping over the last decade of rural water system development in North Dakota by Reclamation. These environmental commitments would be implemented to:

1. Prevent, minimize, or offset the occurrence of or potential for adverse environmental effect.
2. Ensure compliance with applicable Federal and State regulations designed to protect fish and wildlife resources, important habitats and sensitive areas, cultural and paleontological resources, human health and safety, and the public interest.

Under the Proposed Action, Garrison Diversion would ensure the environmental commitments are implemented prior to and/or during construction of the Proposed Project. Appropriate environmental commitments would be incorporated into the designs, construction contracts, and specifications of the project. Reclamation may assemble an Interagency Environmental Review

Team, with appropriate agency representation, to review environmental compliance in the field, if deemed appropriate.

Table 2. Environmental Commitments regarding the Central North Dakota Water Supply Project.

General Best Management Practices
Comply with all appropriate Federal, State, and Local laws.
Follow recommended practices for construction, restoration, and maintenance.
Dump grounds, trash piles, and potential hazardous waste sites will be avoided.
Standard construction industry measures will be taken to minimize fugitive dust emissions during construction activities. Any complaints that may arise will be dealt with in a timely and effective manner.
Equipment will be washed prior to entering the construction site to prevent the spread of noxious and invasive species.
Surface Water and Wetlands
Garrison Diversion will be responsible to comply with the Clean Water Act and avoid permanent impacts to wetlands. The pipeline in the project area will avoid wetlands by either boring underneath wetlands or rerouting around the wetlands.
Woody species including those bordering wetlands, shelterbelts, riparian woodlands, woody draws, or woodland vegetation will be avoided to the extent possible. For unavoidable impacts to woody habitats, replacement plants at a 2:1 ratio of appropriate speciation will be planted.
Erosion control measures will be employed as appropriate: (a) Care will be exercised to preserve existing trees along the streambank. (b) Stabilization, erosion controls, restoration, and re-vegetation of all streambeds and embankments will be performed as soon as a stream crossing is completed and maintained until stable. Riparian woody shrubs and trees will be replanted where and as necessary to preserve the shading characteristics of the watercourse and the aesthetic nature of the streambank.
Conditions of a water service contract will include: maintaining use of the proposed 20 cfs in the Missouri River Basin and water will not be provided to distributions systems that deliver water into the Hudson Bay Basin.
Garrison Diversion will apply for a 401 Water Quality Certification permit for discharge of storm water runoff from the North Dakota Department of Health Division of Water Quality, as appropriate.
Garrison Diversion's will report any spill immediately to the North Dakota Department of Health, and will perform remedial actions as directed by the North Dakota Department of Health.
The Office of the State Engineer (OSE) requests to be notified regarding the proposed project's impacts, if any, to water resources such as watercourses (i.e. streams or rivers), agricultural drains, and wetlands (i.e. ponds, sloughs, lakes, or any series thereof) as any alternations, modifications, improvements, or impacts to those water resources may require a drainage permit(s) or a construction permit(s) from the OSE. Garrison Diversion will apply for the permits, as necessary, through the North Dakota State Water Commission.
Intake Screen Design
Intake screen designs will comply with the State/Federal Agency Fish Screen Guidelines: Intakes shall be screened and maintained with a ¼ inch or smaller mesh size opening.
Intake velocities shall not exceed ½ foot/second with 20 feet of overhead water.
Intake velocities shall not exceed ¼ foot/second if 20 feet of overhead water cannot be achieved.
The intake shall be placed at a maximum practicable depth in relation to extreme, low water elevations.

Intakes shall be marked so they are observable during day and night hours, as appropriate.
Work will not take place in the Canal from April 15 to June 1.
Contact the NDGF to inspect any and all vehicles, vessels, pumps, and equipment that will be used in project waters. A minimum 72-hour notice must be provided to the NDGF for scheduling an inspection (701-368-8368).
Fish and Wildlife Species and Habitat
Construction will avoid: - Wetlands - Federal, State, and Local wildlife areas and refuges - Designated critical habitats
To minimize impacts to fisheries resources any stream identified as a fishery (fisheries – confirm with NDGF) that cannot be directionally bored will be avoided from April 15 to June 1 and crossed later in the summer or fall when flows are low or the stream is dry.
Any new, above ground power lines and an additional equal length of existing power lines in the same vicinity must be marked with visibility enhancement devices to benefit migrating whooping cranes as well as all migratory birds and bats.
Construction within 660 feet of visible nesting bald eagles will be avoided from February through August.
If threatened or endangered species are identified and encountered during construction, all ground-disturbing activities in the immediate area will be stopped until Reclamation can consult with the USFWS to determine appropriate steps to avoid impacting the species.
If any tree (with a diameter of greater than 3 inches) removal activities cannot be avoided between April 1 and October 31, consultation will take place with the USFWS.
Native prairie will be avoided to the extent possible. However, if native prairie sod must be broken, existing topsoil will be carefully salvaged and replanted with native grasses in a timely manner, with a seed mix recommended by the local Natural Resources Conservation Service (NRCS) and approved by Reclamation and the landowner.
Any new signage will be placed in a manner as to not allow raptors to perch by covering the top two holes of the post.
Garrison Diversion, as the contracting partner, assumes responsibility to ensure mitigation for all unavoidable wetland and other wildlife habitat loses with equivalent (like) habitat according to local, state and federal regulations.
Reclamation will ensure the USFWS is provided with the latest-version route maps of the pipeline delivery system to ensure that the USFWS appropriate Refuge and Wetland Management District personnel can identify where the pipeline and USFWS lands interface, allowing for identification of an avoidance route for the contractor. The USFWS advised on two wetland easement tracts crossed by the proposed pipeline alignment. If the alignment crosses the easement, the USFWS requests a meeting with Garrison Diversion and Reclamation before siting or construction for avoidance purposes. The pipeline in the project area will avoid the easements by either boring underneath the easements or rerouting around the easements.
Cultural Resources
All cultural resource investigations will be performed according to the procedures specified in the programmatic agreement among Reclamation, the North Dakota State Historic Preservation Office (NDSHPO), and the Advisory Council on Historic Preservation for Reclamation activities in North Dakota. Cultural resource inventories will be performed under the direction of an archaeologist that meets the Secretary of the Interior's Professional Qualifications Standards (48 FR 44738-9). All appropriate cultural resource activities will be completed prior to the commencement of ground-disturbing activities, including Class I and Class III surveys and consultation with the NDSHPO. All cultural resources, except those exempted in the programmatic agreement, will be avoided if their

significance cannot be established prior to disturbance. If avoidance is not practicable, Reclamation, in consultation with the NDSHPO would determine if the site is eligible for nomination to the National Register of Historic Places [36CFR800.4(c) and 36CFR60.4]. If the site is eligible as a historic property, initially Reclamation, NDSHPO, and other interested parties, depending on the type of property, will consult to determine a plan of mitigation. If an adverse effect cannot be avoided, the Advisory Council on Historic Preservation will be contacted. All ensuing activities will comply with the NHPA, as amended, and the Archaeological Resource Protection Act.
The Tribes will be consulted concerning the locations of unmarked burials or cemeteries. All such burials or cemeteries will be avoided to the extent possible. If a burial or cemetery cannot be avoided or is encountered during construction, Reclamation will comply with the Native American Graves Protection and Repatriation Act if graves are discovered on Federal or trust lands or within reservation boundaries. Reclamation will comply with North Dakota Century Code 23-06-27: "Protection of Human Burial Sites, Human Remains, and Burial Goods" for graves on private or State-owned lands.
If unrecorded cultural resources or traditional cultural properties are encountered during construction, all ground disturbance activity within the area will be stopped, Reclamation and appropriate authorities will be notified, and all applicable stipulations of the NHPA will be followed. Activities in the area will resume only when compliance has been completed.
Paleontological Resources
Reclamation consulted with North Dakota Geological Survey to identify areas for paleontological survey where significant fossils are likely. If fossils are encountered, Garrison Diversion will contact the North Dakota Geological Survey for further information.

Chapter 3 Affected Environment and Environmental Impacts

Introduction

This section describes the existing conditions and potential environmental impacts for resources that may be affected by the Proposed Project. The affected environment includes the existing communities, land, water, and air-sheds that might be affected by the Proposed Project. Environmental impacts include: indirect (generally subsequent to a direct effect but not directly resulting from Proposed Action), positive (beneficial) or negative (adverse), and long term (permanent, long-lasting) or short term (temporary). Measures that would be implemented to reduce, minimize, or eliminate impacts (mitigation measures) are presented in Chapter 2 as an inseparable part of the Proposed Action, Required Mitigation Measures for the Proposed Action, and are discussed under each resource.

The area of potential impacts (affected area) would be resource-specific and is defined in each individual resource discussion. The boundary of the affected area for each resource extends to where effects can be reasonably and meaningfully measured. Direct impacts would generally occur within the Project Area. However, some impacts may occur on a broader scale, encompassing an area beyond the Project Area, particularly for water resources. Impacts that may extend beyond the Project Area are disclosed in the environmental consequences section of each resource.

This Section will address the effects of the No Action, the Proposed Action, and Cumulative Effects, for the following resources: Water Resources and Hydrology, Missouri River Depletions, Threatened and Endangered Species, Bald and Golden Eagle Protection Act, Migratory Bird Treaty Act, Land Resources, Climate Change, Indian Trust Assets, Cultural Resources, and Environmental Justice.

Resource Areas Considered and Eliminated from Further Analysis

In light of Reclamation's environmental commitments (Chapter 2), the programmatic agreement with the North Dakota State Historic Preservation Office, and in response to comments received from the scoping notice, the CNDWSP would have no potential to affect certain resource areas or its affect to certain resource areas is so minor (negligible) that it was not evaluated further in this document. These resources areas include air quality; noise; recreation; public safety, access, and transportation; paleontological resources; wildlife; visual resources, socioeconomics, and environmental justice (Table 3).

Table 3. Resources Eliminated from Further Analysis.

Resource	Rationale for Elimination from Further Analysis
Air Quality	Temporary effects during construction activities including a possible increase in dust. Application of standard construction, industry measures would be taken to minimize fugitive dust emissions during construction activities.

Resource	Rationale for Elimination from Further Analysis
Noise	Temporary effects during construction activities including a possible increase in noise, the impact would be short-term and would occur mainly during daylight hours.
Recreation	Minor impacts to recreation areas (activities including but not limited to hunting, fishing, and camping) are anticipated from the Proposed Action Alternative. Impacts would be temporary and would cease upon completion of construction activities.
Public Safety, Access, and Transportation	No impacts to public safety are anticipated from the Proposed Action Alternative. Public access and transportation have the potential to be temporarily affected during construction activities. Impacts would be temporary and would cease upon completion of construction activities.
Paleontological Resources	No impact to paleontological resources is anticipated from the Proposed Action Alternative. In the event that a paleontological resource is encountered the state paleontologist would be contacted for further instruction.
Wildlife	Impacts to wildlife would include possible displacement due to noise and traffic from construction. Impacts would be temporary and would cease upon completion of construction activities.
Visual Resources	Impacts to visual resources would primarily be temporary and would cease upon completion of construction-type activities. Approximately 0.20 acres of permanent impact would result from the Proposed Action Alternative, including a pump station and parking area.
Socioeconomic	A 20 cfs bulk water supply could result in positive socioeconomic impacts for the communities involved in the project. Information is not available to quantify this effect.
Environmental Justice	No Environmental Justice population has been identified that would disproportionately bear impacts of the project.

Water Resources and Hydrology

Affected Environment

According to the Watershed Boundary Dataset (USDA et al. 2017), the Project Area occurs within the Painted Woods-Square Butte sub-basin Hydrologic Unit (HUC-10130101). The Project Area is further divided into three sub-watershed Hydrologic Units, with the upper portion of the project in Hecker's Lake unit (HUC12-101301010506), the middle portion in Headwaters Painted Woods Creek unit (HUC12-1013010607) and the lower portion in Canfield Lake unit (HUC12-101301010605). The Hecker's Lake unit is classified as a closed basin watershed consisting of 22,483 acres, where all surface drainage is contained within the unit and no overland flow exits the hydrologic unit. However, the construction of the Canal has created an artificial surface connection in the Hecker's Lake Unit, which connects the Canal (New John's Lake) to Painted Woods Creek outlet, which then flows into the Missouri River (USDA et al. 2017). The Headwaters Painted Woods Creek unit consists of 33,394 acre watershed which follows Painted Woods Creek west into the Missouri River. The Canfield Lake unit consists of 31,192 acre watershed which flows north into Painted Woods Creek then west into the Missouri River. Figure 9 depicts surface water flow within the Project Area vicinity. Current reliable surface water supply through the Canal is limited by slides between MM 20 and 22 in Sections 28, 29, 32 and 33, Township 146 North, Range 80 West. An EA to repair that portion of the Canal was completed by Reclamation and the FONSI was signed May 9, 2017 (Reclamation 2017). The repairs, scheduled to occur throughout a 6 year duration, would allow a supply up to

500 cfs through the Canal. Water flow and elevation targets within the Canal are currently operated according to the 1984 Plan of Operation for McClusky Canal (Reclamation 1984).

Due to the potential of saline groundwater from the Painted Woods Creek Aquifer being discharged into the Canal at its intersection with Old John's Lake, a Canal freshening program was implemented from 1984-1986 in order to improve the water quality in Lake Audubon and the Canal (Reclamation 1986). During this freshening program, approximately 40 cfs was routed through the Canal to the Painted Woods Creek outlet at New John's Lake. The water quality of Lake Audubon and the Canal improved during the period of the freshening program; however, data acquired by the Garrison Diversion monitoring program indicates the Painted Woods Creek Outlet has continued to maintain an acceptable level of Total Dissolved Solids (TDS) since the freshening program ended, despite landslide occurrences restricting flow through the Canal (Table 4). The North Dakota Department of Health recommends waters containing more than 500 mg/L TDS not be utilized if other less mineralized sources are available; however, exclusive of most treated public water supplies, Missouri River, and fresh lakes, very few water supplies in the state contain less than 500 mg/L (NDDOH 2014).

Table 4. Monitoring Program Data at the Painted Woods Creek Outlet.

Sample Date	Conductivity (umhos/cm)	Dissolved Solids (Total mg/L)
6/84	-	2905
8/84	-	2655
5/85	-	1715
8/85	-	1150
6/86	-	1275
8/86	-	1110
10/86	-	1115
8/23/2012	1800	1370
6/19/2013	1730	1250
10/1/2014	1810	1300
6/1/2015	1850	1350
8/27/2015	1850	1310
6/6/2016	1860	1380

Environmental Effects of the Proposed Action Alternative

According to the National Wetlands Inventory (NWI) (USFWS 2015), seven freshwater emergent wetlands and one riverine wetland totaling less than two acres are contained within the Project Area (Figure 10). One wetland consists of a temporarily flooded water regime (PEMA), which indicates it receives most of its water from snowmelt and direct precipitation. These types of wetlands are typically farmed each year, since the water has evaporated by mid-summer. Six of the wetlands have a seasonally flooded water regime (PEMC), which indicates they are wet most of the growing season and become dry towards the end of the season; however, the water table is often near the ground surface. One wetland consists of semi-permanently flooded water regime (PEM/ABF), which indicates the surface water persists throughout the growing season in

most years; however, the water table is often near the ground surface in dry years. One riverine wetland is in the Project Area (R2UBGx), which consists of the Canal waters. The description includes the Canal wetland as being contained within an excavated, low gradient, slow velocity channel with sand or mud bottom, and surface water is present throughout the year. (Cowardin et al. 1979). The pipeline in the project area would avoid wetlands either by boring underneath the wetlands or rerouting around the wetlands.

Consultation with U.S. Fish and Wildlife Service (USFWS) indicates two wetland easements within the Project Area. No field wetland delineations or determinations have been conducted to date. The pipeline in the project area would avoid the easements by either boring underneath the easements or rerouting around the easements.

Within the Project Area, groundwater is derived from precipitation and drainage is typically not integrated, not including the presence of the Canal. Water is collected and stored in depressional wetlands and removed by evapotranspiration and/or percolation (Randich and Hatchett 1966). According to 2017 North Dakota State Water Commission groundwater and surface water well data, no wells occur within the Project Area. Most wells within the Project vicinity occur within the boundaries of the Painted Woods creek Aquifer. The Painted Woods Creek aquifer underlies approximately 20 square miles in northwestern Burleigh County and generally follows the valley of Painted Woods Creek (Figure 9). The aquifer, which largely consists of sand and gravel outwash deposits, absorbs large quantities of water from precipitation and has a water table between 5 and 15 feet below the land surface. It is estimated to produce a sodium bicarbonate type water containing approximately 600 ppm dissolved solids (Randich and Hatchett 1966). The Painted Woods Creek aquifer is in contact with the Canal from approximately MM40 to approximately MM50. No impacts to groundwater are anticipated from the Proposed Project.

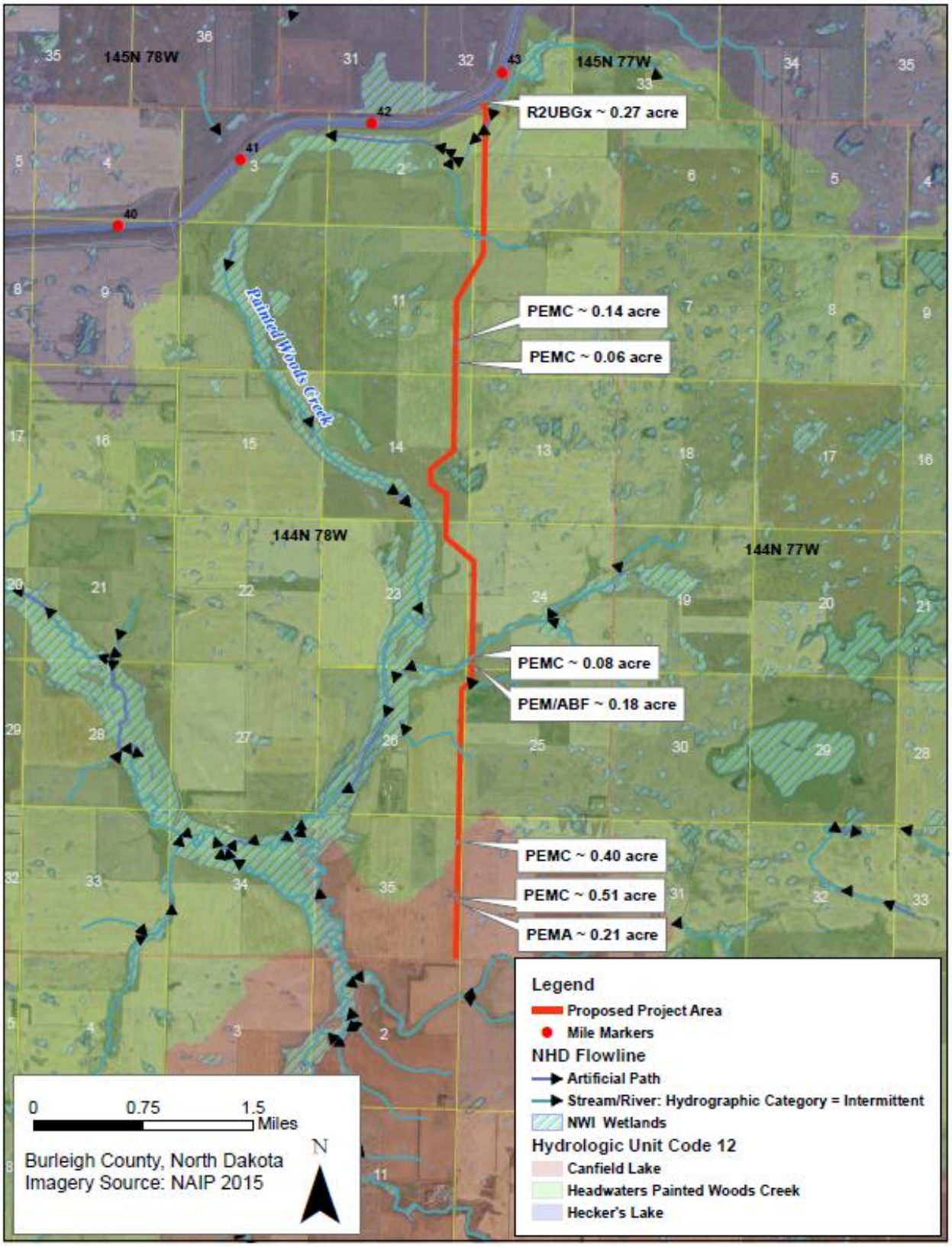

Figure 9. Surface Water Flow and National Wetland Inventory Wetlands within and surrounding the Project Area.

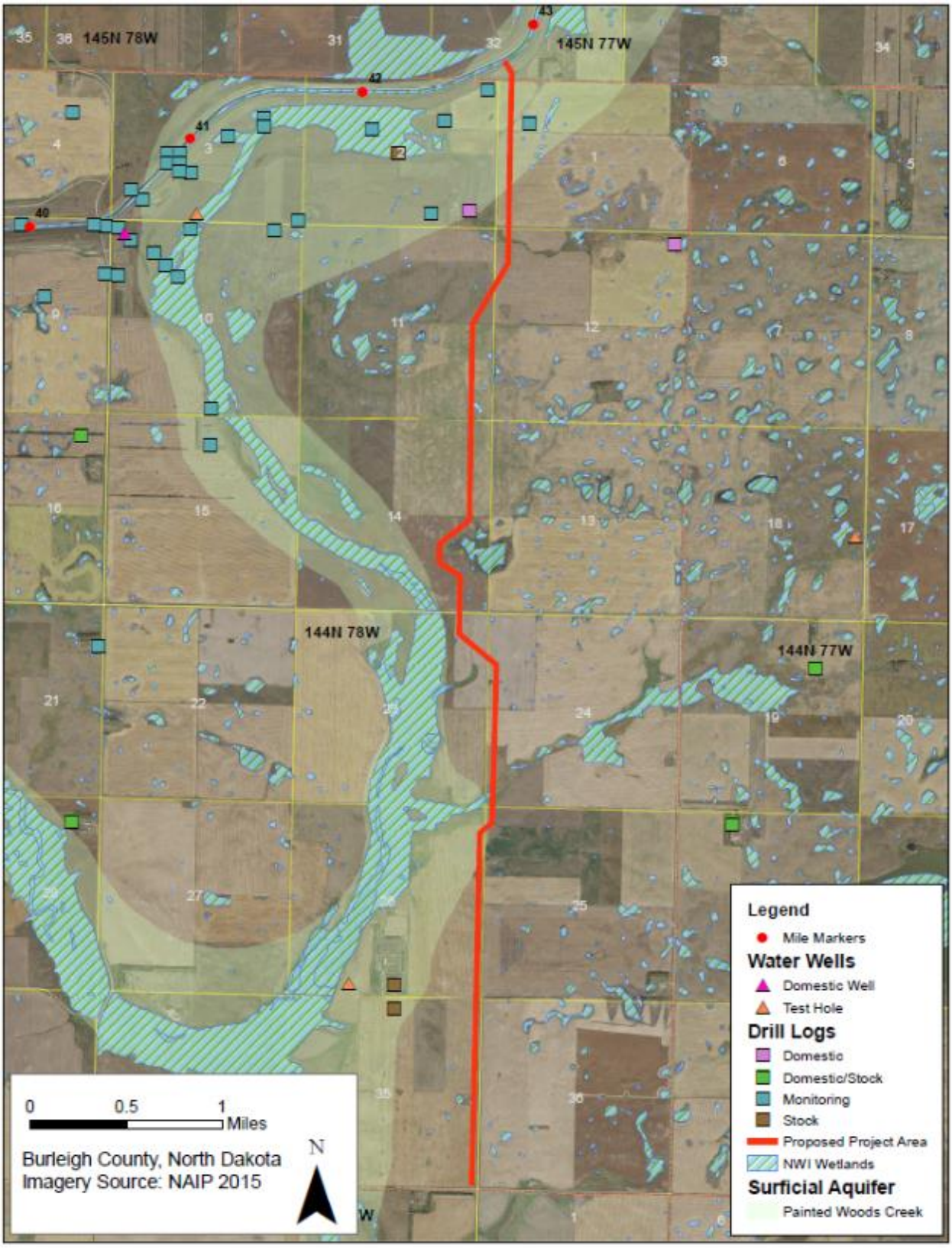

Figure 10. Groundwater in and surrounding the Project Area.

Cumulative Effects

Garrison Diversion is planning to construct the state-sponsored RRVWSP, which would supply additional MR&I water to Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman counties, as well as additional counties within eastern North Dakota. The tie-in and a small portion of the RRVWSP occurs within the proposed 150-foot ROW of the CNDWSP.

The tie-in and portion of the RRVWSP route has no wetland or stream crossings according to the NWI map and there are no wells in this area.

Garrison Diversion is responsible for compliance with USACE permitting requirements in addition to any other state or federal agency consultations with regard to stream and wetland crossings needed for the state-sponsored RRVWSP.

Environmental Consequences of the No Action Alternative

There would be no environmental consequences under the No Action Alternative because the need for the requested 20 cfs and project power would not be met through Reclamation.

Missouri River Depletions

To evaluate the impacts of the Proposed Action on Missouri River resources, Reclamation reviewed the most recent study it conducted on cumulative effects to the Missouri River System which was completed for the Northwest Area Water Supply (NAWS) Project Supplemental Environmental Impact Statement (Reclamation 2015a). That impact analysis was conducted in partnership with the USACE as they are the federal agency responsible for the management and operations of the Missouri River Mainstem System. The final cumulative effects report was published in 2013 (USACE 2013). This is the most recent and comprehensive analysis of its kind within the Missouri River Basin and includes analysis of historic, existing and reasonably foreseeable future actions, including industrial water use for oil and gas.

Environmental Effects of the Proposed Action Alternative

Currently, the average annual depletion in the Missouri River above Garrison Dam is approximately 6.6 million acre-feet (Reclamation 2007a). Thus, withdrawal of an additional 14,483 acre-feet per year would increase annual depletions by about 0.2 percent. Due to the annual depletion for the Proposed Project of 14,483 acre feet, which represents only 0.06 percent of Lake Sakakawea's storage capacity, the effects on reservoir levels and dam releases would likely not be measureable. The Proposed Project would have no impact on Lake Sakakawea storage or ability to meet demand, as the depletions are extremely small relative to the volume of water stored in the reservoir and are already accounted for in the 1,212,348 acre feet of water appropriated in Permit No. 1416 to Reclamation.

Cumulative Effects

This integrated system of Missouri River dams and reservoirs has the capacity to store 72.3 MAF of water. To analyze the potential impacts to the Missouri River resources, Reclamation evaluated the applicability of the recently completed comprehensive Missouri River depletions analysis completed for the NAWS Supplemental Environmental Impact Statement and completed an assessment of any additional reasonably foreseeable future actions identified since

the completion of the 2013 analysis. Reclamation determined the data and analysis completed in 2013 were sufficient and appropriate to use in the Missouri River impact analysis for this EA.

Missouri River Depletions Database

Reclamation maintains a Missouri River depletions database for all of the tributaries within the Missouri River Basin. For background information and details regarding the data and how Missouri River depletions are estimated, please refer to Reclamation's Missouri River Basin Depletions Database report (Reclamation 2012a). The Depletions Database calculates historic water use, present level water use and future water use. Missouri River flow data are maintained by the U.S. Geological Survey with daily data going back to the 1930s. Reclamation used this flow data to calculate Missouri River depletions from 1930 through 2010. Depletions were calculated for irrigated agriculture and public surface water supply systems. Historic depletions are the estimates of the amount of water actually depleted from the surface water in the Missouri River Basin.

Reasonably Foreseeable Future Actions

Based on a review of the criteria used to identify reasonable foreseeable future actions in the 2013 cumulative effects analysis, a reassessment of the reasonably foreseeable future actions included in the 2013 cumulative effects analysis, and an assessment of any additional reasonably foreseeable future actions since the completion of the 2013 analysis; Reclamation concluded the data and analysis were sufficient and appropriate to use in the Missouri River depletions analysis for this CNDWSP EA.

In the 2013 cumulative effects analysis, the following criteria were used to define reasonably foreseeable actions:

- Water withdrawal identified could reasonably be implemented between 2011 and 2060.
- Water withdrawal identified could contribute measurably to cumulative effects in the geographic area and on the Missouri River resources that would be affected by the NAWS Supplemental EIS alternatives.
- Water withdrawal identified has sufficient specifics about the amount of water proposed for withdrawal and other information available to define the activity and conduct a meaningful analysis.
- Water withdrawal has been identified in some type of planning document.
- Reclamation updated a future Missouri River water withdrawal spread sheet updated in 2006 (Reclamation 2006, Red River Valley Water Supply Project EIS) and collected information on the potential new depletions within or from the Missouri River Basin between 2011 and 2060. These potential projects were identified by canvassing Reclamation offices throughout the Missouri River Basin and contacting the Bureau of Indian Affairs to document future tribal projects. When information was readily available, State or local projects were also included if the projects were authorized and funded. Using these data, it was possible to estimate the total anticipated withdrawals through the year 2060 for each Missouri River reach. This collection of information was based on the following assumptions:
    - A previous survey of Missouri River Basin States and intake permit holders to secure current and future water withdrawals was unsuccessful in obtaining

comprehensive water withdrawal information (Corps of Engineers 2004, *Missouri River Mater Water Control Manual March Review and Update FEIS*). It was thought that permitees do not like to reveal this type of information unless required by law. Reclamation determined that the time/cost of doing a comprehensive survey was done in the Master Manual was not reasonable/feasible for the NAWS SEIS. Therefore, no attempt was made to survey states and water permit holders.

- Reclamation recognized there is disparity in water use data available from state water permitting agencies (Committee on USGS Water Resources Research, National Research Council 2002, *Estimating Water Use in the United States: A new Paradigm for the National Water-Use Information Program*). Reclamation used the best available information to document present and future water withdrawals. The availability of water use data varies by state. States within the Missouri River basin do not collect similar types of information. For example, the State of Iowa has a water use permit program, except for agricultural or irrigation water withdrawals from the Mississippi and Missouri Rivers that do not require a permit. Without a permit there is no specific data on withdrawal amounts for this type of water use. The State of Kansas on the other hand permits all water withdrawals. Some states record permitted water withdrawals, but do not require users to report the amount of actual withdrawals.
- It was assumed that large scale projects involving future withdrawals for irrigation and water supply (tribal and state projects) would need to secure federal funding to assist in the development of the project. Historically, sponsors of large scale water projects have relied on federal assistance for the development of their projects and this is not likely to change based on the economic situation faced by most states and tribes.
- Any identified non-federal water supply project for which authorization and funding have been obtained, were added to the list of reasonably foreseeable actions, e.g. Western Area Water Supply Project.
- Missouri River basin future municipal water and public water supply demands were updated and calculated for 2007-2060 and obtained through Reclamation's Great Plains Regional office. This office is responsible for estimating Missouri River depletions that were used by the USACE in their operations of the Missouri River Main Stem System. Population projections from the states and the U.S. Census Bureau were applied to United States Geological Survey (USGS) water use data to estimate future municipal and industrial surface water withdrawals for public water systems.

Projects meeting the criteria above were identified as reasonably foreseeable actions for purposes of the cumulative effects analysis. A majority of the projects identified are dependent upon government funding and may be subject to compact agreements and/or authorizations. Therefore, some of these projects may not be constructed. This was the best available information at the time the analysis was completed and represents a conservative approach that may have overestimated future depletions. Other identified non-federal water supply projects for which authorizations and/or funding had been obtained (e.g. Western Area Water Supply Project and

the state-sponsored RRVWSP in North Dakota) were added to the list of reasonably foreseeable actions.

Twenty-seven tribes are located in the Missouri River basin, 13 of which have reservations located directly on the Missouri River. In 2011-2012, when Reclamation was gathering data on reasonably foreseeable future actions, several of these tribes were in various stages of quantifying their water rights. Tribal projects were considered, but since the water rights have not been adjudicated or specific projects identified, they were not included in the depletion analysis.

Although future projects projected to directly withdrawal water from the Missouri River were accounted for in the analysis; Reclamation addressed reasonably foreseeable water withdrawal throughout the entire Missouri River Basin. Although many of these withdrawals were not a direct withdrawal from the Missouri River, they could affect the amount of water that comes into the Missouri River and therefore were included in the analysis. The process for determining the potential future water withdrawals was based on the primary assumption that public water supply usage would parallel population growth. These depletions for the entire Missouri River Basin were in addition to other future Missouri River depletions directly withdrawn from the Missouri River. The total increase in water depletions for the entire Missouri River Basin was an increase of 205,700 acre-feet. Again, this was a conservative approach to the analysis that may result in an over estimation of future water demands.

Depletions for future industrial water use not supplied by public surface water supply systems were also included as part of the 2013 cumulative effects analysis. At the same time Reclamation was conducting its depletion analysis, the Corps conducted its own independent analyses to evaluate the effects of withdrawing what is called "Surplus Water" for municipal and industrial uses from reservoirs within the Missouri River Mainstem System. "Surplus Water" depletion estimates developed by the Corps for each reservoir included *existing withdrawals* and *potential additional future withdrawals*. The primary water demand driving industrial water needs at this time was the North Dakota oil and gas industry. The Corps' analyses (documented in a series of draft/final reports issued between 2010 and 2012) concluded that the temporary use of Missouri River Reservoir "Surplus Water" would not cause significant adverse effects to existing authorized purposes. These future industrial water use was projected to increase by 10,600 acre-feet.

The 2013 depletion analysis completed by Reclamation and the USACE included a thorough evaluation of historic, present and reasonably foreseeable future actions as explained in the technical report (USACE 2013) and Reclamation's Final SEIS and supporting documents (Reclamation 2015a). In preparing the CNDWSP EA, Reclamation reviewed the data used in the Final SEIS depletion analysis to identify any significant changes to the data. The data and evaluation methods used remain valid today. In a review of the reasonably foreseeable future actions evaluated in the 2013 technical report, Reclamation noted a few of the foreseeable projects have changed slightly; however the overall change in the volume of water for the reasonably foreseeable future actions was nearly zero. The changes include a couple of the reasonably foreseeable future actions have not been realized and the volume of water included

for the state-sponsored RRVWSP has increased slightly from the volume that was included in the Final SEIS analysis (from 122 cfs to 165 cfs). But again, the net change in the volume of reasonable foreseeable future action depletions is nearly zero. Therefore, it is reasonable to conclude that the potential impacts of the CNDWSP on the Missouri River Mainstem System would be very similar to the potential impacts disclosed in the Final SEIS (Reclamation 2015a) and those impacts were negligible.

Environmental Consequences of the No Action Alternative

Under the No Action Alternative, Garrison Diversion and the communities of North Dakota would need to consider other options to meet the MR&I needs of Central North Dakota.

Threatened and Endangered Species

Reclamation consulted the USFWS, North Dakota Ecological Service's Office website (https://www.fws.gov/northdakotafieldoffice/SEtable.pdf) and the Information, Planning, and Conservation System (IPaC) (https://ecos.fws.gov/ipac/) to obtain a list of threatened and endangered species and critical habitats associated with the affected area (Table 5).

This section constitutes the Biological Assessment for the Proposed Action as required under Section 7(c) of the Endangered Species Act of 1973, as amended, in compliance with regulations found at *50 CFR Part 402 Interagency Cooperation – Endangered Species Act of 1973, as Amended*.

Action Area

The Action Area identified is based on Reclamation's assessment of the potential direct and indirect effects of the Proposed Action to federally listed species (50 CFR 402.02). The evaluation of federally listed species focuses on the aquatic and terrestrial environments that may be influenced by the activities of the CNDWSP. The Action Area for Reclamation's contract decision to make federal power and water available includes the Canal at MM 42.5, MM 42.5 lands, proposed electrical facilities, and the approximate 6 mile water transmission pipeline, including the 150-foot ROW. Figure 11 illustrates the Action Area and general areas in or associated with Reclamation's Principal Supply Works including Snake Creek Pumping Plant, Audubon Lake, and the Canal.

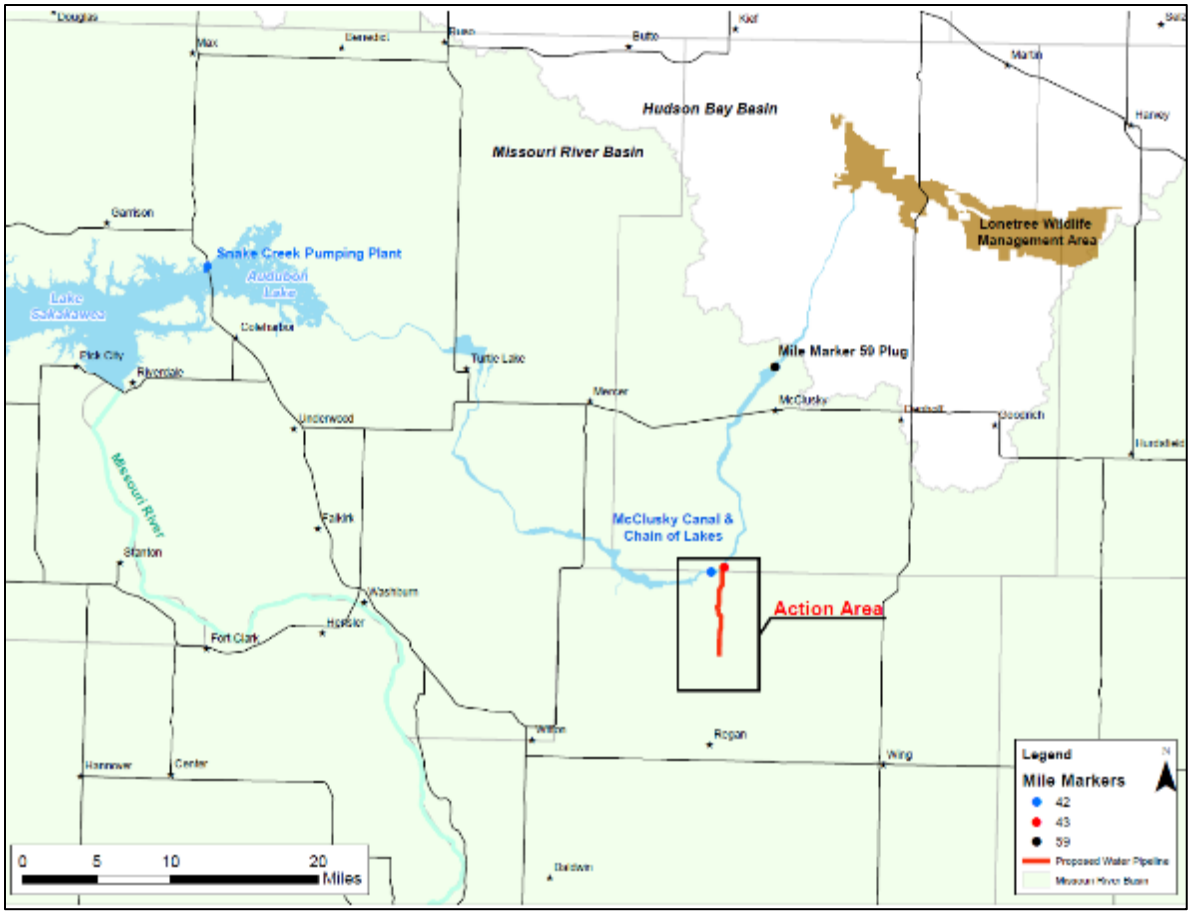

Figure 11. Reclamation's Principal Supply Works and Action Area.

Reclamation's Biological Assessment for the RRVWSP (Reclamation 2007b) and Reclamation's supplemental memo to the USFWS regarding the Biological Assessment for the RRVWSP (Reclamation 2008) have previously found no adverse modification to critical habitat on Lake Sakakawea, the Garrison reach of the Missouri River, Audubon Lake, or the Canal and not likely to adversely affect any threatened or endangered species, including the interior least tern, piping plover, critical habitat for the piping plover, pallid sturgeon, gray wolf, and whooping crane as a result of the project depletions from the Missouri River. The USFWS concurred with that finding. Additionally, Reclamation completed a Biological Assessment for the Northwest Area Water Supply, completed April 2016, which received a concurrence letter from the USFWS dated April 2, 2015, which confirms the above conclusion (Reclamation 2015b). Therefore, to avoid duplication of effort and redundancy, Reclamation will incorporate by reference that review and those findings and concurrence regarding the lack of effect on Lake Sakakawea, the Snake Creek Pumping Plant, Audubon Lake, and the Canal outside the vicinity of MM 42.5.

Table 5. Federally Threatened, Endangered Species and Designated Critical Habitat Listed in the Counties of the Action Area.

Group	Species	Federal Status[1]
Bird	Interior Least Tern	E

	Whooping Crane	E
	Piping Plover	T, CH
	Rufa Red Knot	T
Fish	Pallid Sturgeon	E
Mammal	Gray Wolf	E
	Northern Long-Eared Bat	T

T = threatened, E = endangered, CH = critical habitat.

Interior Least Tern (*Sterna antillarum*)


Source: http://tpwd.texas.gov/huntwild/wild/species/leasttern/

Interior least terns are 8 to 10 inches in length, have a black crown on their head, a white underside and forehead, grayish back and wings, orange legs, and a yellow bill with a black tip.

Population Rangewide

There are three subspecies of least tern: the eastern or coastal least tern (*Sterna antillarum antillarum*) that breeds along the Atlantic and Gulf Coast, the California least tern (*Sterna antillarum browni*) that breeds along the California Coast, and the interior least tern (*Sterna antillarum athallasos*) that extends from Texas to Montana, and from eastern Colorado and New Mexico to southern Indiana. The interior least tern was listed as endangered in 1985 (*Federal Register* 50:21784-21792). Historically, interior least terns utilized major river systems from Texas to Montana, and from eastern Colorado and New Mexico to southern Indiana. However, due to dams and channelization, much of their suitable nesting habitat has been eliminated and their food sources have been disturbed. Wintering locations have been documented along the Central American and South American coasts, from Venezuela to northeastern Brazil. Partial monitoring data from 2012 show population estimates at 13,855 (USFWS 2013a). The range-wide survey would suggest that overall the interior population of the least tern has surpassed the 7,000 birds' recovery goal, but the distribution of those numbers and management of those areas are not yet as envisioned by the USFWS when the recovery plan was written.

Action Area

In North Dakota, the interior least tern nests on sparsely vegetated sandbars on the Missouri River and on shorelines of Missouri River reservoirs, where they feed mostly on small fish. The majority of interior least terns in North Dakota are on the Garrison Reach of the Missouri River. Partial monitoring data for the Missouri River from 2012 show interior least tern numbers at 742 (USFWS 2013a). Breeding season lasts from May through August, with peak nesting from mid-June to mid-July. Although the Action Area contains small fish, the interior least tern preferred nesting and foraging habitat of sandy, vegetated shorelines and sandbars does not occur within the Action Area.

Piping Plover (*Charadrius melodus*) and its Designated Critical Habitat

Source: https://www.fws.gov/midwest/endangered/pipingplover/pipingpl.html

Piping plovers are about 7 inches in length and have a sand-colored upper body, and white underside. Breeding birds have a single black breastband, a black bar across the forehead, bright orange legs and bill, and a black tip on the bill. In the winter, piping plovers lose the black band, legs become a pale yellow, and the bill is mostly black.

Population Rangewide

Three sub-populations of piping plover have been identified: an interior Great Plains population, Atlantic Coast population, and a Great Lakes population. The piping plover was listed as threatened in 1985 (*Federal Register* 50:50726-50734). The breeding range includes Alberta, Saskatchewan, Manitoba, Montana, North Dakota, Minnesota, South Dakota, Nebraska, and Iowa. Wintering locations includes the Atlantic Coast from North Carolina south to Florida and on the Gulf of Mexico from Florida to Texas; northern Cuba, Puerto Rico, Bahamas, Greater Antilles, eastern Mexico, and the Yucatan Peninsula. Much like the interior least tern, piping plover numbers have declined due to dams and channelization, reducing suitable habitat. In 2006, the adult population of piping plovers was estimated at approximately 8,100, with 3,000 of that estimate in the Northern Great Plains (Elliott-Smith et al. 2009).

The USFWS designated critical habitat for the Great Plains breeding population in 2002 (*Federal Register* 67:57637), Great Lakes breeding population in 2001 (*Federal Register* 66:22938), and the winter piping plover population in 2001 (*Federal Register* 66:36038).

Action Area

Piping plover nesting and foraging habitat in North Dakota consists of barren sand and gravel bars and shorelines of the Missouri River and shorelines of prairie alkali lakes. The piping plover occurs in North Dakota from mid-April to August, with peak breeding season from May to mid-July. The piping plover preferred nesting and foraging habitat of barren sand and gravel bars and shorelines of alkali lakes does not occur within the Action Area.

Designated critical habitat of the piping plover in North Dakota includes numerous alkaline lakes, Lake Sakakawea and the Missouri River. No designated critical habitat for the piping plover occurs within the Action Area. The Action Area lies between two areas of designated critical habitat. McLean 8 occurs approximately 14 miles northwest and Burleigh 1 occurs approximately 16 miles southeast from the Action Area (Figure 12).

Figure 12. Designated Critical Habitat for the Piping Plover in North Dakota.

Rufa Red Knot (*Calidris canutus rufa*)

Rufa red knots are typically 9 to 11 inches in length. During the breeding seasons they are a mottled gray, black, and white that run into stripes on their head and face with a cinnamon-brown underside and face. The legs and bill are black. The bill is straight tapering to the tip. During the non-breeding season rufa red knots are white and gray.

Source: http://ecos.fws.gov/ecp0/profile/speciesProfile?spcode=B0DM; https://www.allaboutbirds.org/guide/red_knot/id

Population Rangewide

The rufa red knot was listed as threatened in 2014 (*Federal Register* 79:73706-73748). The red knot migrates between its breeding grounds in the Canadian Arctic and several wintering regions, including the southeast United States, the northeast Gulf of Mexico, northern Brazil, and Tierra del Fuego at the southern tip of South America. During both the northbound and southbound migrations, red knots use key staging and stopover areas to rest and feed. Long-distance migrant shorebirds are highly dependent on the continued existence of quality habitat at a few key staging areas. These areas serve as stepping stones between wintering and breeding areas. Many of the key migration staging areas are along the coasts but there are records that show small numbers (fewer than 10) of red knots migrating together in the interior states as well.

Action Area

While little is known about interior migrating red knots, they are believed to be rare migrants through North Dakota, occasionally utilizing wetlands as stopover habitat. Migration through North Dakota occurs from mid-May to mid-September, early October. Geolocator results from a study of eight knots wintering in Texas found five of the birds used the Northern Great Plains (Saskatchewan, Canada and North Dakota) as a stopover (USFWS 2013b). According to Ebirds.org, ten locations throughout North Dakota have documented observations of small number of red knots since 1982, with the nearest observations to the Action Area at Audubon Lake and Lonetree Wildlife Management Area (WMA), both approximately 32 miles away. Migration of the red knot through North Dakota is rare and although wetlands occur within the Action Area, the habitat is marginal in comparison to surrounding areas with documented use, such as Lonetree WMA.

Whooping Crane (*Grus americana*)

Source: https://www.fws.gov/midwest/whoopingcrane/

Whooping cranes reach approximately 5 feet tall and have a wingspan that can reach 7½ feet. Whooping cranes are almost entirely white with black wingtips, and have a red patch on the head that extends from the cheek along the bill. The eyes are yellow and they have black legs.

Population Rangewide

The whooping crane was listed as endangered in 1967 (*Federal Register* 32:4001). Whooping crane recovery efforts have made great strides over the years, with new populations being established in Florida and Wisconsin. The birds that migrate through North Dakota are part of the Aransas-Wood Buffalo population. Approximately, 329 whooping cranes were estimated during the winter 2015-2016 survey, centered on the Aransas National Wildlife Refuge (Whooping Crane Conservation Association 2016).

The whooping crane recovery plan includes scientific information about the species and provides objectives and actions needed to down-list the species (Canadian Wildlife Service and U.S. Fish and Wildlife Service 2007). Recovery actions designed to achieve these objectives include protection and enhancement of the breeding, migration, and wintering habitat for the Aransas-Wood Buffalo population. The goals are to allow the wild flock to grow and reach ecological and genetic stability; reintroduction and establishment of geographically separate self-sustaining wild flocks to ensure resilience to catastrophic events; and maintenance of a captive breeding flock that is genetically managed to retain a minimum of 90 percent of the whooping cranes' genetic material for 100 years.

Action Area

The whooping crane passes through North Dakota each spring and fall while migrating between its breeding territory in northern Canada and wintering grounds on the Gulf of Mexico, frequently migrating with sandhill cranes. Whooping cranes are usually found in small groups

of seven or fewer individuals and are easily disturbed when roosting or feeding. They prefer freshwater marshes, wet prairies, shallow portions of rivers and reservoirs, grain and stubble fields, shallow lakes, and wastewater lagoons for feeding, loafing, and roosting. Fall migration occurs in North Dakota from late September to mid-October, while spring migration occurs from late April to mid-June. Birds can appear in all parts of North Dakota, although most sightings are in the western two-thirds of the state. Whooping crane observations have been made adjacent to the Canal during migration, but are considered rare. The closest observation occurred on April 2008, approximately 2.5 miles northwest of MM 42.5. Please refer to Figure 13 for Whooping Crane Observations in the CNDWSP Area.

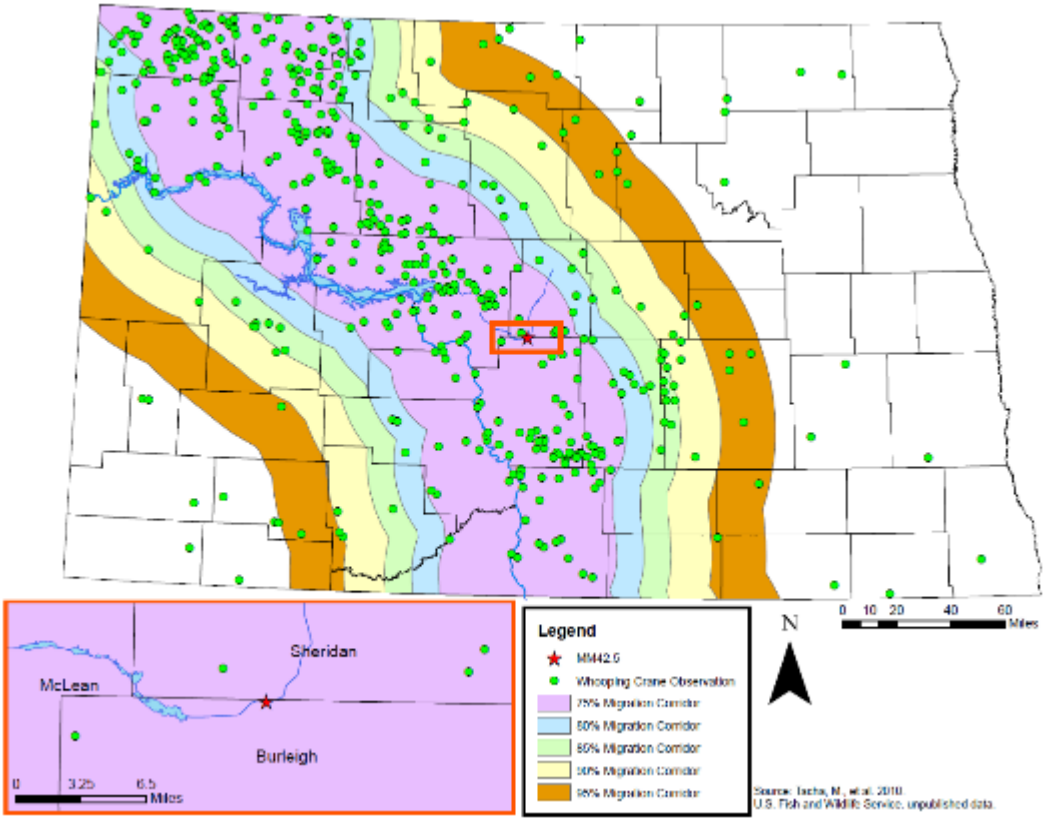

Figure 13. Whooping Crane Observations in the Central North Dakota Water Supply Project Area.

Pallid Sturgeon (*Scaphirhynchus albus*)

Pallid sturgeon are one of the largest fish found in the Missouri and Mississippi River Systems, weighing up to 85 pounds. Pallid sturgeon are typically light brown with a white underside. The snout is flat and shovel-shaped with fleshy chin barbels.

Source: https://www.fws.gov/southdakotafieldoffice/STURGEON.HTM

Population Rangewide

The pallid sturgeon was listed as endangered in 1990 (*Federal Register* 55:36641-36647). The pallid sturgeon requires turbid water and flow rates of large, free-flowing rivers. Historically, the geographic range included the lower 200 miles of the Yellowstone River; the Missouri River (from Fort Benton, MT to St. Louis, MO); the Mississippi River from St. Louis south to Louisiana; larger tributaries include the Platte, Kansas, St. Francis, Ohio, Arkansas, and Yazoo/Big Sunflower Rivers; and the Atchafalaya River. The total length of the pallid sturgeon's historical range was approximately 3,515 river miles (USFWS 2014b). A majority of its habitat has declined due to river channelization, construction of impoundments, and related changes in water flow. Today, the pallid sturgeon has been limited to fragmented segments of free-flowing rivers within its historical range (Figure 14).

Figure 14. Current Range of Wild and Hatchery-Reared Pallid Sturgeon (available at: https://www.fws.gov/mountain-prairie/species/fish/pallidsturgeon/recoveryplan2014.pdf).

Action Area

Pallid sturgeon observations have been reported on the Missouri River in North Dakota between Fort Peck Dam and Lake Sakakawea (Jordan 2006). The Canal does not contain habitat for the pallid sturgeon.

Northern Long-eared Bat (*Myotis septentrionalis*)

Source: https://www.fws.gov/wyominges/Species/NLEBat.php

Northern long-eared bats are a medium-sized bat, with very long ears. Their length is 3.0 – 3.7 inches with a wingspan of 9 – 10 inches. The fur color is medium to dark brown on the back with a tawny to pale-brown on their underside.

Population Rangewide

The northern long-eared bat was listed as threatened in 2015 (*Federal Register* 80:17974-18033) with a 4(d) rule in 2016 (*Federal Register* 81:1900-1922). The range of the northern long-eared bat includes much of the eastern and north-central United States and most of the Canadian provinces. The northern long-eared bat spends winters hibernating in caves and mines. In summer, the northern long-eared bat roosts underneath bark of live and dead trees, rock crevices, caves, mines, barns, and sheds. The dramatic decline of the northern long-eared bat is due to white-nose syndrome. There are many unknowns regarding white-nose syndrome, however it is expected that the disease will spread throughout the United States (Figure 15). Other sources of decline include impacts to hibernacula, degradation of summer habitat, and wind farm operation.

Action Area

Little work has been conducted in North Dakota to document the distribution of the northern long-eared bat in North Dakota. Summer surveys in North Dakota (2009 – 2011) documented this species in the Turtle Mountains, the Missouri River Valley, and the Badlands (Gillam and Barnhart 2012). Gillam and Barnhart (2012) found most of this bat species using tree roosts particularly cottonwoods. To date, no hibernacula or bat activity during the winter months has been documented in the state. Based on this species ecology and range, it is unlikely that this species would occur in the Action Area.

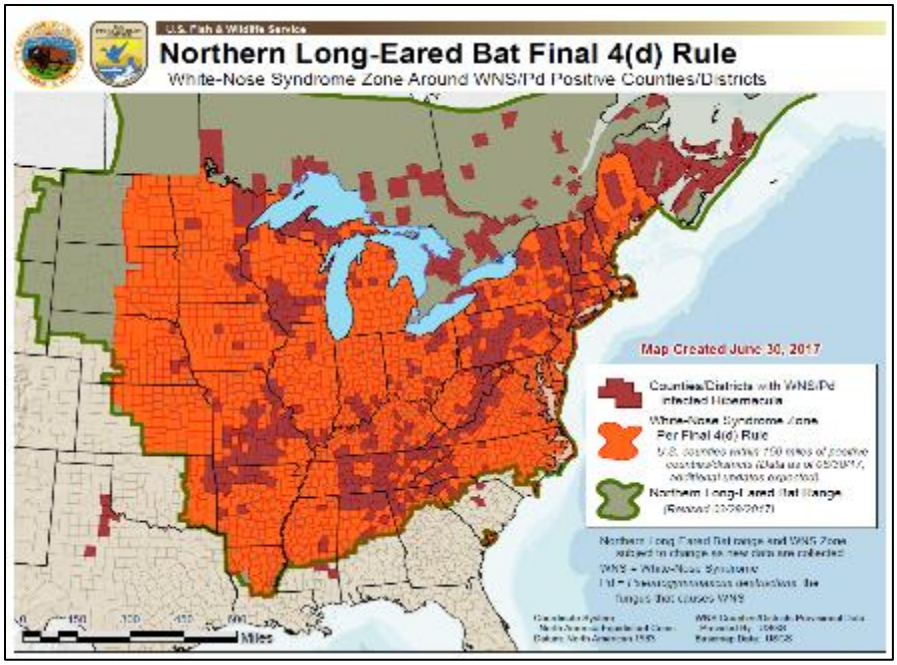

Figure 15. White-Nose Syndrome Zone (available at: https://www.fws.gov/Midwest/endangered/mammals/nleb/pdf/WNSZone.pdf).

Gray Wolf (*Canis lupus*)

The gray wolf is the largest living member of its family (Canidae), with males averaging 88 pounds and females generally weighing 5-10 pounds less. Fur color in individuals can range from black to gray to white, sometimes red and brown. The gray wolf is a keystone predator and is considered a habitat generalist, occurring in temperate and boreal forests, mountains, tundra, and grasslands.

Population Rangewide

By the time wolves were protected by the ESA of 1973, only a few hundred remained in extreme northeastern Minnesota and a small number on Isle Royale, Michigan. The status of the gray wolf has changed multiple times since the original 1973 listing. In December 2011, the USFWS revised and removed the Western Great Lakes Distinct Population Segment of gray wolf from the list of endangered and threatened wildlife (*Federal Register* 76:81665-81726). In February 2015, following court orders, the USFWS reinstated the March 9, 1978 (*Federal Register* 43:9607) regulatory protection for the gray wolf, including the endangered status for gray wolves in the eastern half of North Dakota (*Federal Register* 80:9218-9229). Wolves can occupy a wide range of habitats where large ungulates are typically found, including forests, prairies, including agricultural and pasture lands.

Action Area

The gray wolf is an infrequent visitor to North Dakota, occasionally entering the state from Minnesota or from Manitoba, Canada. The increasing wolf population in Minnesota and the accompanying expansion of wolf range westward and southwestward in the state have led to an increase in dispersing wolves in North Dakota. As the Minnesota and Canada populations continue to increase, North Dakota could expect to see additional transients. No surveys have

been conducted to document the number of wolves in North Dakota; however, occasional lone dispersers that appear primarily in the eastern portion of the state. There were reports of pups in the Turtle Mountains of North Dakota, one wolf sighting was confirmed in early 2004, and two wolf depredation incidents were verified north of Garrison in late 2005 (*Federal Register* 71 (58):15286). There have been no verified recent sightings in the Project Area.

Due to the relative absence of secluded habitat in most of North Dakota, there is considerable uncertainty regarding whether a wolf pack will establish or become more common in the state. According to Licht and Huffman (1996), wolves could recolonize portions of their former range on the prairie in the Dakotas. However, the agricultural dominated landscape (cropland, hayland and pasture) and relatively high densities of roads would facilitate negative encounters between wolves and humans, which could preclude their re-establishment.

Environmental Effects of the Proposed Action Alternative

Due to the distance of the Action Area to the Missouri River and the absence of suitable habitat within the Action Area, ***the Proposed Project will have no effect on the interior least tern, piping plover, piping plover designated critical habitat, or pallid sturgeon.***

Although wetlands providing potential habitat for whooping crane and rufa red knot occur in the Action Area, sightings of both species are rare in North Dakota and no recorded observations of either species has occurred within the Action Area. Therefore, ***the Proposed Project will have no effect on the rufa red knot and whooping crane.***

North Dakota is not identified as a recovery area and gray wolves occur as rare, sporadic transients with no established populations in the state; therefore, ***the Proposed Project will have no effect on the gray wolf.***

Northern long-eared bat may use "suitable" roosting trees within the Action Area. However, Reclamation is not aware of any survey results, nor have maternity roost trees or hibernacula been identified within the Action Area. Using 2015 National Agriculture Imagery Program (NAIP) aerial imagery, approximately 0.11 acres of tree removal would occur within the Action Area. The trees would be removed during the non-active time of year from November 1 to March 31; ***therefore, the Proposed Project will have no effect on the northern long-eared bat.***

No endangered species are known to occupy the Action Area; however, Reclamation will require that Garrison Diversion incorporate into their construction plans, instructions to the contractor that in the event that any threatened or endangered species are encountered during activities, the contractor will contact Reclamation. Reclamation will consult with the USFWS to determine the appropriate steps to avoid any effects to these species, including cessation of construction. Additionally, any new, above ground power lines and an additional equal length of existing power lines in the same vicinity must be marked with visibility enhancement devices to benefit migrating whooping cranes as well as all migratory birds and bats.

Cumulative Effects

Garrison Diversion is planning to construct the state-sponsored RRVWSP. The tie-in of the proposed CNDWSP to the state-sponsored RRVWSP and a small segment of the state-sponsored

RRVWSP would occur in the Action Area. Pipeline construction activities would be temporary and Garrison Diversion would reclaim lands as outlined in Land Resources.

Environmental Consequences of the No Action Alternative

The No Action Alternative would not involve ground disturbing activities associated with pipeline or intake construction. The No Action Alternative would have ***no effect on the interior least tern, piping plover, piping plover designated critical habitat, rufa red knot, whooping crane, pallid sturgeon, gray wolf, or northern long-eared bat.***

Bald and Golden Eagle Protection Act

Bald eagles (*Haliaeetus leucocephalus*) range in size from 30 – 43 inches in length, with a wingspan of 80 inches (6.5 feet). Their weight ranges from 6 – 14 pounds, with females typically larger than males. Adult bald eagles have a dark brown body with a white head and tail. The geographic range of the bald eagle is throughout most of North America. Both year-round and migratory individuals occur in North Dakota. Preferred habitat includes the Missouri River system, including Lake Sakakawea, the Heart River, Cannonball River, Sheyenne River, Red River, Souris River, and the Devils Lake basin (Figure 16A).

Source: http://www.southdakotamagazine.com/eagle-season

Golden eagles (*Aquila chrysaetos*) range in size from 30 – 40 inches in length, with a wingspan of 79 inches (6.5 feet). Their weight ranges from 6.5 – 13.0 pounds, with females typically larger than males. Adult golden eagles are mostly dark brown, with golden brown feathers on head and nape. The geographic range of the golden eagle is throughout most of North America, with breeding in the western United States, southwestern Canada, and northern Mexico. Both year-round and migratory individuals occur in North Dakota. The badlands and Lake Sakakawea breaks are preferred habitat of golden eagles (Figure 16B).

Source:
http://www.sdakotabirds.com/species/golden_eagle_info.htm

The Bald and Golden Eagle Protection Act (16 U.S.C. 668-668d, 54 Stat. 250) as amended, was enacted in 1940 and prohibits anyone, without a permit, from taking bald eagles or golden eagles, including their parts, nests, or eggs.

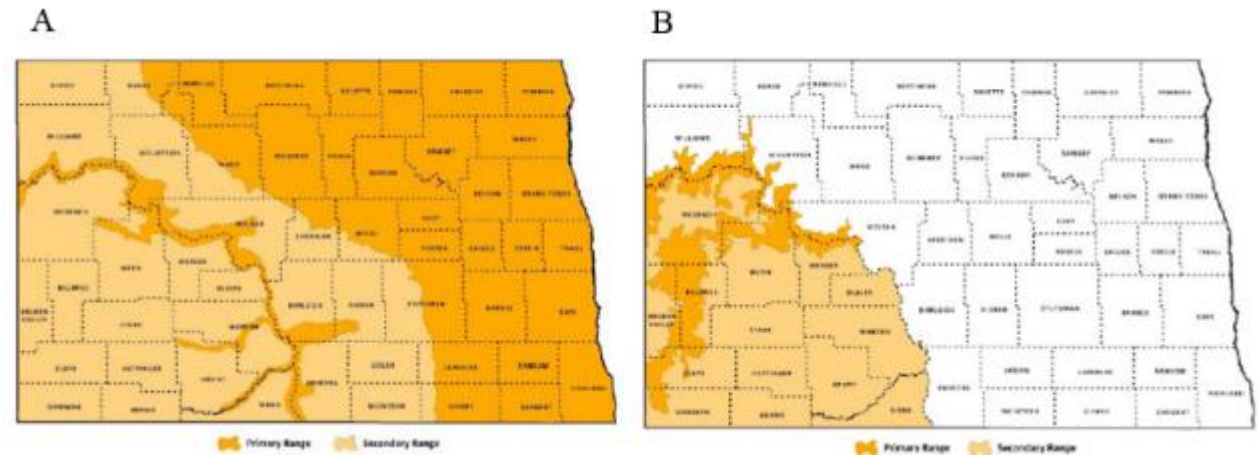

Figure 16. Primary and Secondary Range of Bald Eagles (A) and Golden Eagles (B) in North Dakota (NDGF 2016a; NDGF 2016b).

Environmental Effects of the Proposed Action Alternative

Golden eagle habitat does not occur in the Project Area. The Project Area occurs in the secondary range of the bald eagle. No known bald eagle nests occur in the Project Area. However, in the event that a bald eagle nest is observed:

- Construction within 660 feet of visible nesting bald eagles will be avoided from February 1 to August 15;
- Any new, above ground power lines and an additional equal length of existing power lines in the same vicinity must be marked with visibility enhancement devices to benefit migrating whooping cranes as well as all migratory birds and bats.

Cumulative Effects

Garrison Diversion is planning to construct the state-sponsored RRVWSP. The tie-in and portion of state-sponsored RRVWSP occurs in the secondary range of the bald eagle (Figure 16A). Pipeline construction activities would be temporary and Garrison Diversion would reclaim land as outlined in Land Resources. Garrison Diversion would coordinate with the USFWS, as necessary, for the Bald and Golden Eagle Protection Act.

Environmental Consequences of the No Action Alternative

The No Action Alternative does not include any ground disturbance or construction activities. Therefore, the No Action Alternative would have no impact to golden eagles or bald eagles.

Land Resources

Affected Environment

Landcover in the Project Area includes agricultural crops, native grasslands and tame grasslands. According to LANDFIRE (2013) data, 10 classifications of landcover occur in the Project Area. The dominant landcover includes Modified/Managed northern Tallgrass Grassland (Table 6; Figure 17), which is an area that is dominated by introduced perennial forbs or grassland species including but not limited to: *Cirsium* spp. (thistle spp.), *Centaurea* spp. (knapweed spp.), *Euphorbia esula* (leafy spurge), *Melilotus* spp. (sweetclover spp.), *Agropyron cristatum* (crested

wheatgrass), and *Bromus inermis* (smooth brome) (LANDFIRE 2013). According to USDA (2016), crops in the Project Area include: spring wheat, barley, and soybeans, with a large percentage of the area in developed/open space and grass/pasture.

Table 6. Landcover Types in Project Area (LANDFIRE 2013).

LANDFIRE Classification	Acres
Modified/Managed Northern Tallgrass Grassland	53.6
Western Cool Temperate Urban Herbaceous	15.8
Western Cool Temperate Close Grown Crop	15.6
Western Cool Temperate Wheat	8.9
Developed-Roads	5.8
Western Cool Temperate Undeveloped Ruderal Grassland	4.9
Western Cool Temperate Developed Ruderal Grassland	2.7
Western Cool Temperate Pasture and Hayland	2.7
Open Water	0.7
Western Great Plains Depressional Wetland Systems	0.7
Total Acres	**111.2**

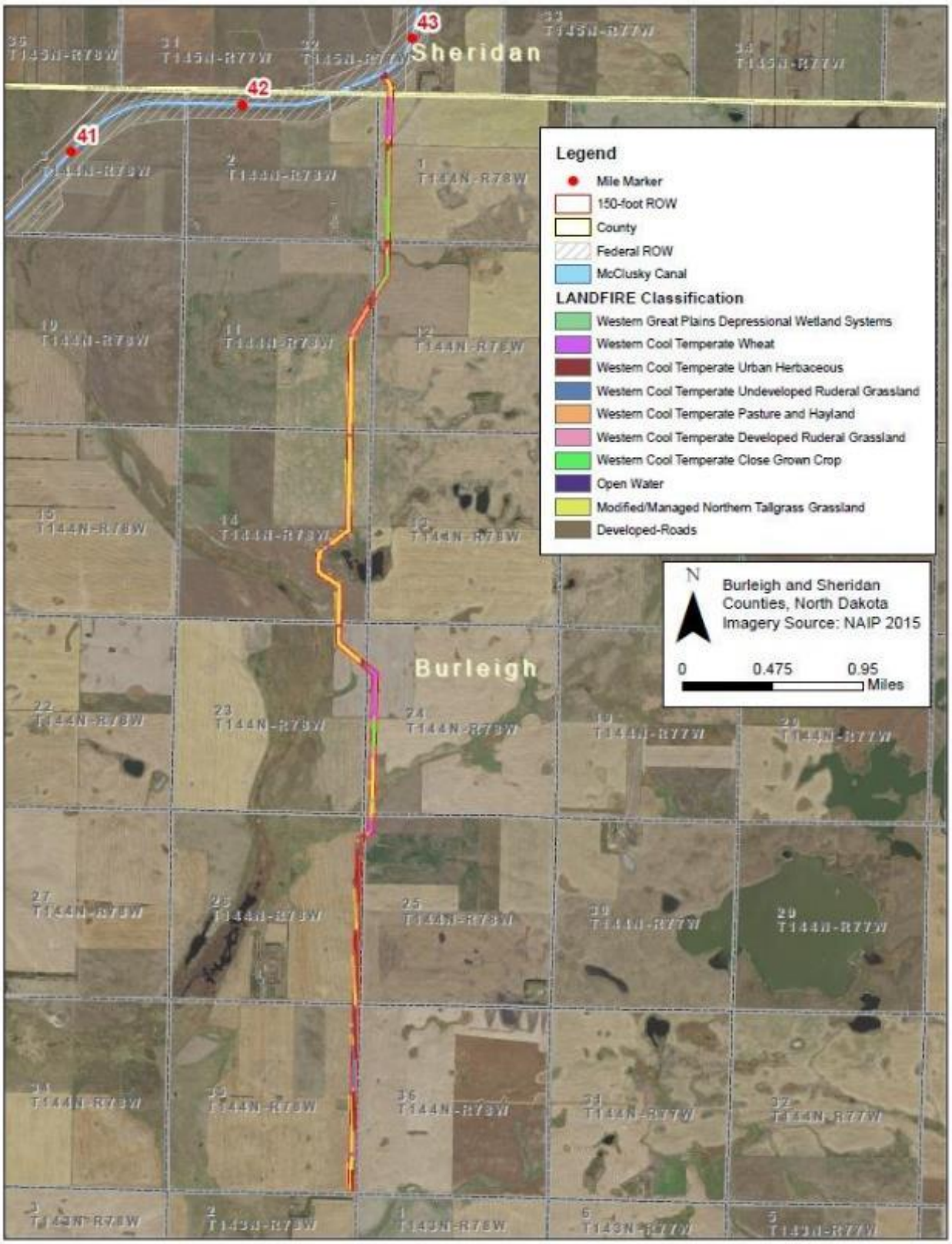

Figure 17. Landcover Types in Project Area (LANDFIRE 2013).

There are 11 weeds declared noxious by the state of North Dakota. Counties are able to list additional weeds if needed, Burleigh County has no additional weeds listed as noxious and Sheridan includes *Cirsium vulgare* (bull thistle) and *Asclepias syriaca* (common milkweed). Six noxious weeds were recorded in 2016 for Burleigh County, for a total of 18,522 acres and three noxious weeds were recorded in 2016 for Sheridan County, for a total of 175 acres (Table 7).

To limit and prevent the spread of noxious weeds, standard cleaning and inspection practices are required for all equipment used in the Project Area (Reclamation 2010).

Table 7. Noxious Weed Acreage in Burleigh and Sheridan Counties, North Dakota (North Dakota Department of Agriculture 2016).

Common Name	Scientific Name	Burleigh (acres)	Sheridan (acres)
Absinth wormwood	*Artemisia absinthium*	9,100	60
Canada thistle	*Cirsium arvense*	6,600	75
Dalmatian toadflax	*Linaria genistifolia*	-	-
Diffuse knapweed	*Centaurea diffusa*	-	-
Leafy spurge	*Euphorbia esula*	2,800	40
Musk thistle	*Carduus nutans*	14	-
Purple loosestrife	*Lythrum salicaria*	1	-
Russian knapweed	*Centaurea repens*	-	-
Saltcedar	*Tamarisk ramosissima*	-	-
Spotted knapweed	*Centaurea maculosa*	7	-
Yellow toadflax	*Linaria vulgaris*	-	-
Total		**18,522**	**175**

According to Web Soil Survey, a majority of the 14 soil types in the area consist of a loamy surface texture and are categorized as Williams-Bowbells loam soil type or Lehr loam (Table 8, Figure 18). According to the average K factor value for the Project Area, the soils are moderately susceptible to sheet and rill erosion by water. According to the average Wind Erodibility Group for the soils in the Project Area, they are not highly susceptible to wind erosion in cultivated areas. Approximately 56 acres of Farmland of Statewide Importance occur within the Project Area. This land includes areas identified at the state level that contain soils that produce high yields of crops when treated and managed according to acceptable farming methods. While they are not classified as prime farmlands, they contain similar characteristics to prime farmlands (NRCS 2017).

Table 8. Soil Types and Classifications (NRCS 2017).

Acres	Soil Type	Farmland Classification	Surface Texture	Wind Erodibility Group (Most 1-Least 8)	K Factor Whole Soil (Low 0.02-High 0.69)
46.11	Williams-Bowbells loams, 3 to 6% slopes	Statewide importance	loam	6	0.24

Acres	Soil Type	Farmland Classification	Surface Texture	Wind Erodibility Group (Most 1-Least 8)	K Factor Whole Soil (Low 0.02-High 0.69)
15.96	Lehr loam, 0 to 2% slopes	Not prime	loam	5	0.28
13.96	Lehr loam, 2 to 6% slopes	Not prime	loam	5	0.28
8.50	Flaxton-Livona fine sandy loams, 3 to 6% slopes	Statewide importance	fine sandy loam	3	0.15
7.56	Appam sandy loam, 2 to 6% slopes	Not prime	sandy loam	3	0.15
6.48	Williams-Zahl-Zahill complex, 6 to 9% slopes	Not prime	loam	4L	0.24
3.70	Wabek-Lehr-Appam complex, 9 to 25% slopes	Not prime	loam	5	0.32
3.62	Marysland loam, 0 to 1% slopes	Not prime	loam	4L	0.20
1.97	Appam sandy loam, 0 to 2% slopes	Not prime	sandy loam	3	0.15
1.61	Vallers, moderately saline-Parnell complex, 0 to 1% slopes	Not prime	loam	4L	0.2
1.34	Ustarents loamy, canal-Water complex, 0 to 75% slopes	Not prime	loam	4L	0.32
1.03	Roseglen silt loam, 0 to 2% slopes	Statewide importance	silt loam	6	0.37
0.68	Tansem-Roseglen silt loams, 2 to 6% slopes	Statewide importance	loam	6	0.32
0.16	Zahl-Williams loams, 9 to 15% slopes	Not prime	loam	4L	0.24
112.68	**Total**				

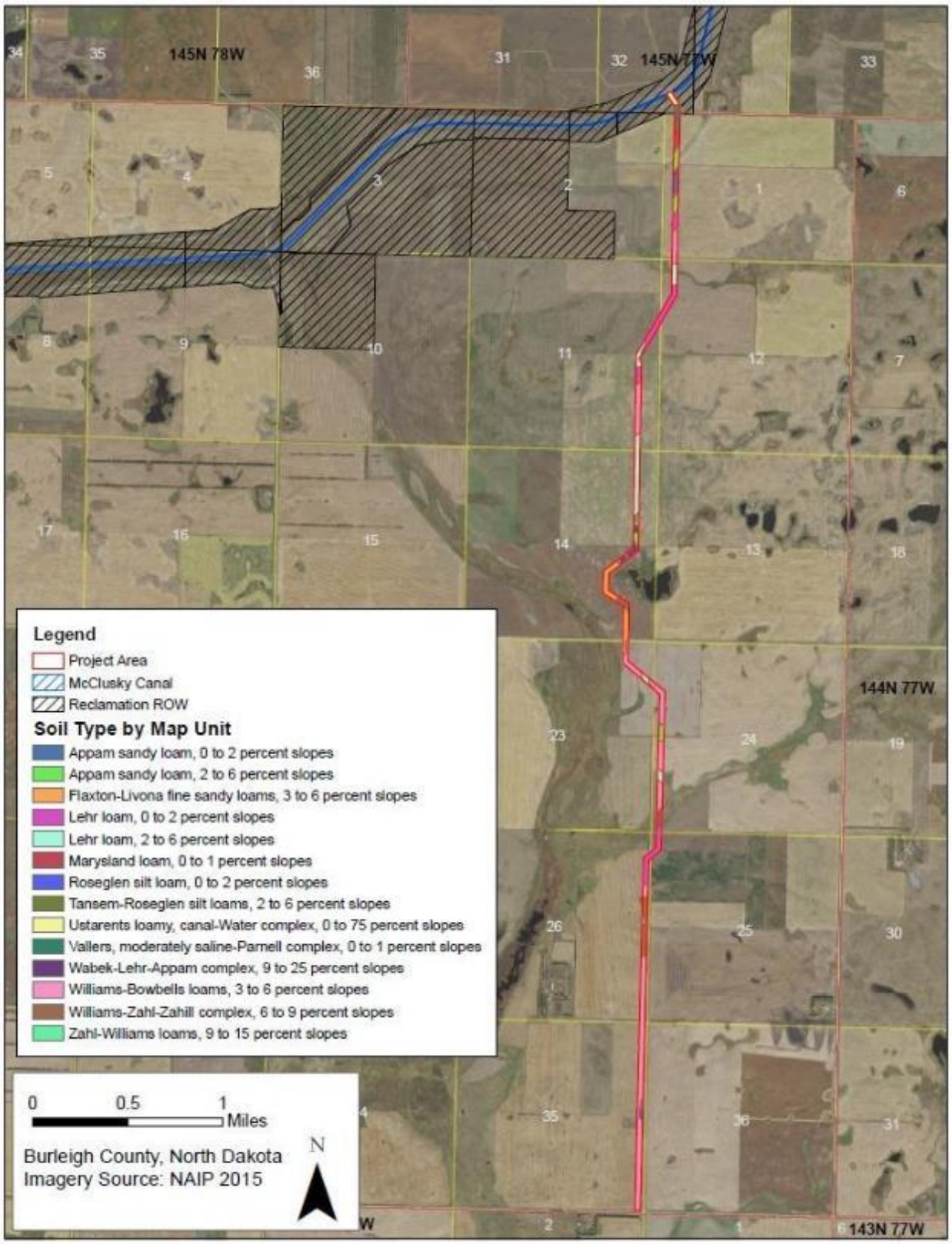

Figure 18. Soil Types and Classifications (NRCS 2017).

Environmental Effects of the Proposed Action Alternative

The Proposed Project would cross Reclamation lands, private lands, and intersect two USFWS wetland easements. The pipeline in the project area would avoid the wetlands easements by either boring underneath the easements or rerouting around the easements. To proceed with the pipeline route, the USFWS requests a meeting with Garrison Diversion at the easement locations prior to siting/construction. North Dakota State Trust Lands contacted Reclamation during the release of the draft EA and noted the proposed route would traverse State School Trust Land. An easement would need to be obtained prior to construction. Private landowners would be contacted to obtain easements and determine the best route across their property. Approximately 0.20 acres of lands would be permanently impacted through the construction of the pump station and associated facilities.

Temporary impacts to cropland and soil resources during project construction may include the introduction of noxious and invasive vegetation, increased susceptibility to erosion, mixing of soils horizons, and compaction. To mitigate any potential crop damages to private landowners, Garrison Diversion has agreed to pay demonstrated crop damage incurred as part of the construction, installation, repair or maintenance of the water pipeline. BMPs would be implemented to prevent the spread of noxious and invasive weeds, including washing equipment prior to bringing on-site. After construction, noxious weeds would be controlled within the pipeline ROW by Garrison Diversion. BMPs to prevent wind and water erosion include the use of fiber rolls or mats, straw waddles or silt fences where appropriate, and vegetation establishment as approved by the landowner once construction is complete. Topsoil would be segregated from subsoil prior to construction and placed on the surface after pipeline construction is complete. Impacts are expected to be temporary.

Cumulative Effects

Garrison Diversion is planning to construct the state-sponsored RRVWSP. The tie-in of the proposed CNDWSP to the state-sponsored RRVWSP and a small segment of the state-sponsored RRVWSP would occur in the defined geographic scope. The area crossed by the tie-in and portion of the state-sponsored RRVWSP includes Modified/Managed Northern Tallgrass Grassland, Western Cool Temperate Urban Herbaceous, and Developed-Roads (LANDFIRE 2013). According to LANDFIRE (2013), Modified/Managed Northern Tallgrass Grassland are areas dominated by introduced perennial forb or grassland species; Western Cool Temperate Urban Herbaceous includes areas with a mixture of some constructed materials, but mostly vegetation in the form of lawn grasses; and Developed-Roads are roads in highly developed areas where people reside or work in high numbers (impervious surface account for 80 to 100% of the total cover).

One major soil type occurs in the tie-in of the proposed CNDWSP to the state-sponsored RRVWSP and a small segment of the state-sponsored RRVWSP and includes Williams-Bowbells loams (3 to 6 percent slopes). Williams Bowbells loams is classified as farmland of statewide importance.

According to the “Red River Valley Water Supply Project- Serving the Water Supply Needs of Central ND and the Red River Valley Landowner Process” (Garrison Diversion 2017b), the

following land reclamation actions would be implemented as part of the state-sponsored RRVWSP:

1. Excavate and segregate soils into three categories; black topsoil, brown root growing zone, and gray no grow zone (Figure 19);
2. Fill trench with appropriate soils for maximum growing conditions;
3. Crop Damage Policy that works for the landowners;
4. Investigate BMPs used by other water systems and industry leaders.

A typical pipe trench section is depicted in Figure 20.

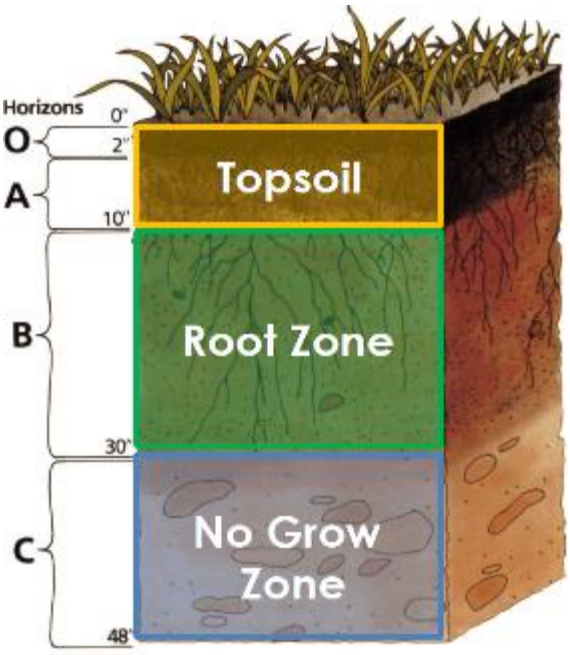

Figure 19. Soil Categories in the Soils Excavation and Segregation Plan for the State-sponsored RRVWSP (Kover 2017).

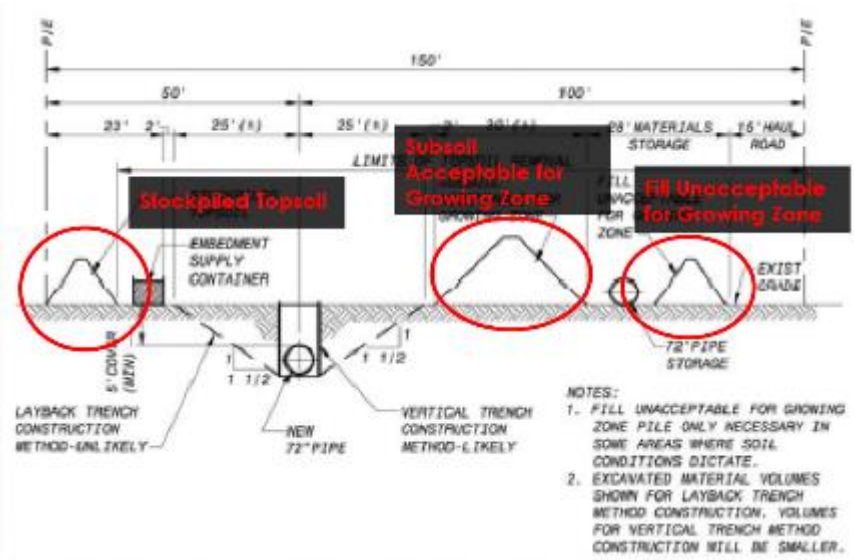

Figure 20. Typical Pipeline Trench Section Proposed for the State-sponsored RRVWSP (Kovar 2017).

Environmental Consequences of the No Action Alternative
The No Action Alternative, would not result in impacts to land resources.

Climate Change
Greenhouse gases (GHGs) including water vapor, carbon dioxide (CO_2), and methane absorb energy, preventing the loss of heat to space, known as the greenhouse effect (EPA 2016). Anthropogenic sources of GHGs, especially from the burning of fossil fuels, have increased the greenhouse effect, thus causing an increased amount of heat retained by Earth's atmosphere (EPA 2016). This section describes the current climate conditions and predictions associated with climate change for the affected area.

Methods
Climate data for this section of the EA were obtained from Reclamation. Projected changes in precipitation and temperature utilized 231 downscaled climate projections from 36 Coupled Model Intercomparison Project phase 5 (CMIP5) global climate models (Reclamation 2013). The CMIP5 projections start from different pre-industrial estimates of climate state, or initial conditions, and considers the multiple future pathways for GHG emissions while simulating a climate response to these GHG scenarios. Additionally, Reclamation utilized the West-Wide Climate Risk Assessment (WWCRA) for flow projections (Reclamation 2012b).

Affected Environment
North Dakota's climate is typical of continental climate with extremes of winter cold and summer heat. January is the coldest month with average temperatures from 0 °F located in the northeast to 15 °F in the southwest and July is the warmest month with average temperatures from 65 °F in the northeast to 72 °F in the south (NOAA n.d.). The highest and lowest temperature on record is 121 °F and -60 °F, respectively (NOAA n.d.). Annual precipitation ranges from approximately 14 to 22 inches from northwestern to southeastern North Dakota, with most precipitation occurring from April through September (NOAA n.d.).

The uncertainties of climate change make reliability of site-specific prediction speculative. Between 1901 and 2008, temperatures in the northern Great Plains have risen approximately 1.85 °F and precipitation has increase more than 4% (Reclamation 2013). In combination with these trends the area also is experiencing a decline in spring snowpack, reduced snowfall to winter precipitation ratios, and earlier snowmelt runoff (Reclamation 2013).

Based on the CMIP5 climate projections, the trend depicted in historical data will likely continue into the future for the northern Great Plains. Figure 21 illustrates the percent change in precipitation and °C change from 1970-1999 to 2040-2069, utilizing the median downscaled CMIP5 projection. The region, including the Project Area, is projected to generally become warmer and wetter as a result of climate change.

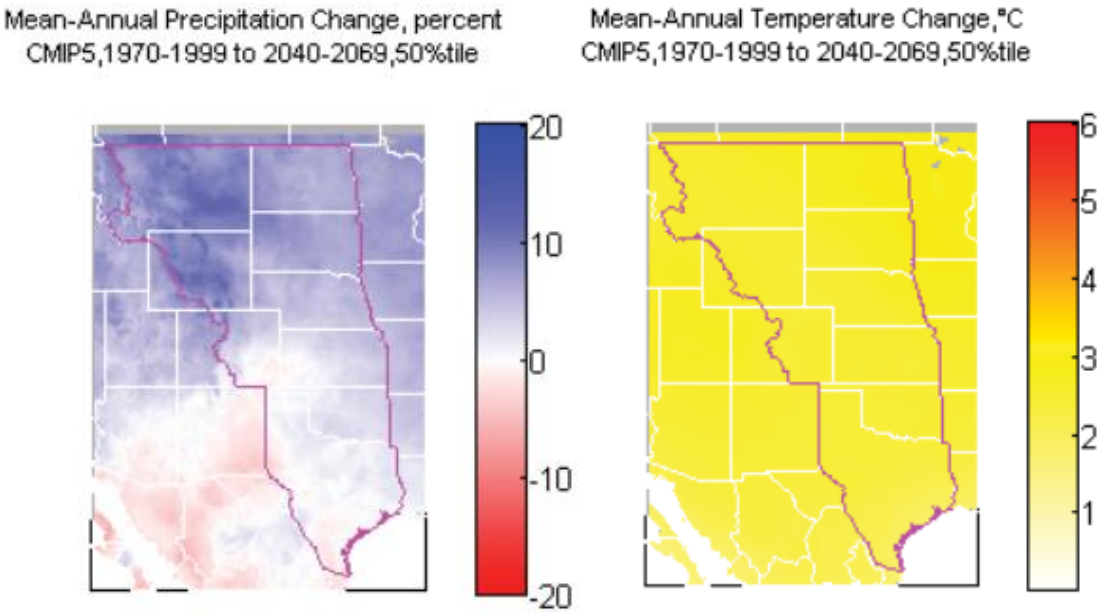

Figure 21. Ensemble-median changes in precipitation and temperature for 2040-2069 relative to 1970-1999, utilizing CMIP5 (Bureau of Reclamation 2013).

Changes would be expected for runoff and streamflow with warming temperatures. A large proportion of annual runoff comes from spring snowmelt, and increased temperatures may change the patterns of runoff and streamflow (Gleick and Adams 2000). For example, more precipitation may fall as rain instead of snow in the winter months. Figure 22 depicts the range of monthly flow changes for the 2040-2069 period relative to 1950-1999 at the Missouri River, Garrison Dam, North Dakota, based on 112 downscaled CMIP3 climate and hydrology projections (Bureau of Reclamation 2012b). Flows are predicted to increase from December to June and decrease from July to November.

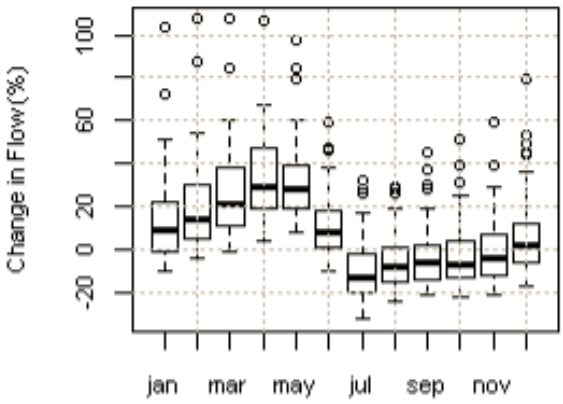

Figure 22. Boxplot of Mean Monthly Flow Changes in the Missouri River at the Garrison Dam, North Dakota (2040-2069 relative to 1950-1999) (Bureau of Reclamation 2012b). The box represents the 25th- and 75th- percentile projections, the whiskers represent the 5th- and 95th- percentile projections, the bar within the box represents the median projection, and open circles represent the outliers (outside of the 5th and 95th percentile).

Environmental Effects of the Proposed Action

Effect of the Project on Climate Change
Emissions of CO_2 and other GHGs from the construction component of the Proposed Project would be low, and would not substantively contribute to climate change.

Effect of Climate Change on the Project
Water availability and need could be affected by climate change. As temperatures increase, the demand for water would potentially increase. Changes in annual precipitation have the potential to affect the volume and seasonality of runoff in the Missouri River, the source of water for the CNDWSP.

Cumulative Effects
Garrison Diversion is proposing to construct the state-RRVWSP; however it is speculative at this point to quantify emissions from their proposed construction activities due to the lack of detailed plans available at this time.

Environmental Consequences of the No Action Alternative
Under the No Action Alternative, no additional GHG emissions would occur.

Indian Trust Assets

Affected Environment
ITAs are "legal interests in property or resources held in trust by the United States for Indian tribes or individual Indians" (Reclamation 1993). The Secretary of the Interior is the trustee for the United States on behalf of Indian tribes. ITAs include land, minerals, timber, ethnobotanical resources, hunting and fishing rights, water rights, and in-stream flows. ITAs may be located on or off-Reservation lands. During the NEPA process, Reclamation, as a representative of the Secretary of the Interior, must evaluate whether the Proposed Action may affect ITAs. This policy reaffirms the legal trust relationship and the government-to-government relationship between the Secretary of the Interior and Indian tribes.

For the Proposed Project, Indian water rights are the primary ITA involved. The tribe's water right to the Missouri River stems from the Supreme Court decision in *Winters v. United States* (1908), known as the Winters doctrine. According to the doctrine, the establishment of an Indian reservation implied that sufficient water was reserved to fulfill purposes for which the reservation was created, with the priority date being the date the reservation was established. As such, quantified Indian water rights for both surface and groundwater, constitute an ITA. In *Arizona v. California* (1963) the U.S. Supreme Court held that water allocated should be sufficient to meet both present and future needs of the reservation to assure the viability of the reservation as a homeland. These rights are also not forfeited by non-use. To date, several Missouri River Basin tribes in Montana and Wyoming have quantified their water rights on the Missouri River; however, water rights in North Dakota remain unquantified. The Three Affiliated Tribes, with the Agreement at Fort Berthold (July 27, 1866) and subsequent

establishment of the Fort Berthold Indian Reservation, have water rights to the Missouri River main-stem flow; this water right is currently unquantified.

The USACE is responsible for operation of reservoirs within the Missouri River Basin, including Lake Sakakawea. Under the Winters doctrine, the USACE recognizes that American Indian Tribes are entitled to water rights in streams running through and along Reservation boundaries. The USACE recognizes tribal water rights to the Missouri River regardless of whether these rights have not been quantified or adjudicated. In effect, if a tribe adjudicated their water right on Lake Sakakawea, the USACE would consider it an existing depletion and adjust operations accordingly.

> "When a Tribe exercises its water rights, these consumptive uses will then be incorporated as an existing depletion. Unless specifically provided for by law, these rights do not entail an allocation of storage. Accordingly, water must actually be diverted to have an impact on the operation of the System. Further modifications to System operation, in accordance with pertinent legal requirements, will be considered as Tribal water rights are exercised in accordance with applicable law" (USACE 2006).

Environmental Effects of the Proposed Action

The Proposed Action Alternative would not preclude the Tribes right or ability to exercise their water right to the Missouri River. However, in the event Tribes quantify their reserved water rights in the future and put the water to beneficial use, the volume of water available for other users in the Missouri River Basin may be affected. Therefore the CNDWSP could be affected if it were to lose the 20 cfs source of water from the Missouri River. The Proposed Action Alternative would not affect ITAs, including land, minerals, timber, ethnobotanical resources, hunting and fishing rights, water rights, and in-stream flows.

Environmental Consequences of the No Action Alternative

The No Action Alternative would not affect ITAs including land, minerals, timber, ethnobotanical resources, hunting and fishing rights, water rights, and in-stream flows.

Cultural Resources

Affected Environment

Reclamation manages cultural resources along the Canal in accordance with Section 110 and Section 106 of the NHPA and other applicable laws and regulations. Under Section 110 of the NHPA, Reclamation has completed cultural resource surveys at the Canal and has conducted evaluations to determine what cultural resource sites are eligible for listing on the National Register of Historic Places (NRHP). Sites that are determined to be eligible for listing on the NRHP are given high cultural resource management consideration and status as historic properties. Section 106 of the NHPA requires Reclamation to consider effects to historic properties when planning and implementing actions such as those identified in this EA.

The Canal is located in the Southern Missouri River Study Unit, which is one of 13 Study Units (drainage basins) used for prehistoric and protohistoric archeological site studies and management in North Dakota (Gregg et al. 2008). The majority of the cultural resource sites

along the Canal are prehistoric stone circle sites and cairns. Stone circle sites, also called tipi ring sites, are distinguished by one or more circular rings of stone. Cairn are a pile or clustering of stones of varying size and shape. Rock cairns have been used for various purposes including, but not limited to, capping human burials, and ceremony, cache, trail, and boundary markers. Additional site types include prehistoric occupation sites, lithic scatters, historic sites, and sites consisting of the skeletal remains of prey animals. Occupation sites are scatters of artifacts, bone, pottery shards, and fire-cracked rock. Lithic scatters are distinct accumulations of stone (lithic) tools and/or debris from tool making. The sites consisting of faunal remains lack artifacts, but they appear to be have been made as the result of human activity. The Canal itself does not yet meet the criteria of a historic property due to its age.

The Canal ROW was originally surveyed by the River Basin Survey staff of the Smithsonian in 1966 (Mallory). Additional surveys were performed by University of North Dakota Archaeological Research (UNDAR) in 1997 (Wermers and Klinner 1998) and 1998 (Wermers and Klinner 1999), along with evaluative test excavations in 2000 (Klinner et al. 2002).

Potential Effects of the Proposed Action

Activities under the Proposed Action would occur within in the Canal ROW and in parcels of private land adjacent and south of the Canal. No historic properties are located within the Canal ROW. Reclamation lands in a previously surveyed or disturbed area with a lack of historic properties, and issuance of special use permits and temporary water service contracts, represents exempted activities under the *Programmatic Agreement between the Bureau of Reclamation, the Advisory Council on Historic Preservation, and the North Dakota State Historic Preservation Officer for the Implementation of Reclamation Undertakings in North Dakota (MOU No. 3-FC-60-03300),* Part II(c) (1) and Appendix I (B) (5). A Class I and Class III cultural resource inventory will be completed for the portions of the Project Area that fall outside of the existing Canal ROW prior to the commencement of ground-disturbing activities. Under the NHPA, criteria are used to determine a cultural resource site's NRHP eligibility (36 CFR 60.4). In addition, criteria in 36 CFR Part 800 are applied to determine effects to historic properties. Any new cultural resources and historic properties identified during the survey(s) will be evaluated for listing on the NRHP, as necessary. Newly recorded resources whose significance cannot be established prior to disturbance will be left unevaluated for the NRHP. Previously identified cultural resources and historic properties outside of the Canal ROW will be assessed based on their previous NRHP evaluations.

- Cultural resources determined to not be NRHP eligible are managed to the discretion of Reclamation.

- The preferred treatment of the unevaluated cultural resource sites would be avoidance. However, if avoidance is not possible, the unevaluated sites within the area of potential effect would be evaluated for eligibility to the NRHP. Reclamation would then consult with the NDSHPO on the determination of NRHP eligibility and effects in accordance with the NHPA.

- As stated above, cultural resource sites that are included in or eligible for listing on the NRHP are given special status as historic properties. The preferred treatment of historic

properties would be physical avoidance through the planning and design of activities and facilities and/or the avoidance of adverse effects. Reclamation would consult with the NDSHPO on the determination of effect in accordance with the NHPA if avoidance is not possible. The resolution of adverse effects would be done in consultation with the NDSHPO and tribes.

With the above stipulations, Reclamation has determined that Proposed Action would have no effect on historic properties.

Environmental Consequences of the No Action Alternative

There would be no effect to historic properties under the No Action Alternative.

Cumulative Effects

Garrison Diversion plans to construct the state-sponsored RRVWSP and is responsible to comply with the rules and regulations for cultural resources management as determined by NDSHPO.

Chapter 4 Agency Consultation and Coordination

Reclamation's Scoping Notice and responses to Reclamation's Scoping Notice are included in Appendix C. No private party responses were received. Seven agency letters of response were received: North Dakota Department of Health, North Dakota Geological Survey (State Geologist), North Dakota Geological Survey (State Paleontologist), North Dakota State Historical Preservation Office, North Dakota Department of Transportation, North Dakota Game and Fish Department, and the State Water Commission.

Multiple phone calls and email correspondence took place between Reclamation and the USFWS regarding wetland easements in the Project Area. The USFWS advised on two wetland easement tracts crossed by the proposed pipeline alignment. The pipeline in the project area would avoid the easements by either boring underneath the easements or rerouting around the easements. If the alignment crosses the easement, the USFWS requests a meeting with Garrison Diversion and Reclamation before siting or construction for avoidance purposes.

A draft EA was released in August 2017. Multiple comments were received including a request for a 30-day extension for review from Missouri DNR. Reclamation granted a 15-day extension for additional review. Comments were received from the BIA, Coalition to Protect the Missouri River, Global Affairs Canada, Province of Manitoba Sustainable Development, Missouri DNR, North Dakota Trust Lands, North Dakota Department of Health, and the North Dakota State Water Commission (Appendix A).

North Dakota State Trust Lands contacted Reclamation during the release of the draft EA and noted the proposed route would traverse State School Trust Land. Garrison Diversion would need to obtain an easement from the North Dakota State Trust Lands prior to construction if State School Trust Land is traversed by the CNDWSP.

The North Dakota State Water Commission requests Garrison Diversion to submit a surface drain application if any ponds, sloughs, lakes or any series thereof are impacted by the project and have a watershed area of 80 acres or more. Also Garrison Diversion will notify the North Dakota State Water Commission if there are any impacts to water resources that a drainage permit(s) may be required.

Substantial comments were received from the Coalition to Protect the Missouri River, Global Affairs Canada, Province of Manitoba Sustainable Development and the Missouri DNR that required the revision of sections to the draft EA.

A revised draft of the EA was released in April 2018 (Appendix B). Missouri DNR requested a 30-day extension for review. Reclamation granted a 15-day extension for additional review of the revised draft EA. Comments were received from the City of Carrington, Coalition to Protect the Missouri River, Global Affairs Canada, Province of Manitoba Sustainable Development, Missouri Department of Natural Resources, McLean-Sheridan Rural Water District, North Dakota Department of Health, North Dakota State Water Commission, and North Dakota Department of Transportation (Appendix B).

Comments on the revised draft EA from the City of Carrington, Coalition to Protect the Missouri River, Global Affairs Canada, Province of Manitoba Sustainable Development, McLean-Sheridan Rural Water District, Missouri Department of Natural Resources, North Dakota Department of Health, North Dakota State Water Commission, North Dakota Department of Transportation and Reclamation's responses are included in Appendix B.

Documents throughout the project timeline have been made available on Reclamation's Dakotas Area Office website at: https://www.usbr.gov/gp/dkao/index.html.

Approximately 50 individuals including Native American Tribes, North Dakota's congressional delegation, appropriate state and federal agency contacts, associated county government auditor offices, private individuals, non-government organizations and 3 published newspapers, the Bismarck Tribune, McClusky Gazette, and Jamestown Sun were contacted throughout the Project (Appendix D).

Compliance with Environmental Statutes

If the Proposed Action Alternative would be implemented, it would be accomplished in accordance and compliance with the following environmental laws, regulations, directives and compliance with the following:

- American Indian Religious Freedom Act of 1978 (P.L. 95-341)
- National Historic Preservation Act of 1966 (P.L. 89-665), as amended 1992 (P.L. 102-575)
- Native American Grave Protection and Repatriation Act (P.L. 101-601)
- Archaeological and Historic Preservation Act (P.L. 93-291)
- Archaeological Resources Protection Act of 1979 (P.L. 96-95)
- National Environmental Policy Act of 1969 (42 USC 4321)
- Clean Air Act (33 USC 7401) and Amendments
- Clean Water Act (33 USC 1251 et seq.), Sections 401, 402, and 404
- Endangered Species Act of 1973 (P.L. 93-205) (16 USC 1531-1544)
- Farmland Protection Policy Act (P.L. 97-98)
- Fish and Wildlife Coordination Act of 1958 (P.L. 85-624)
- Indian Trust Responsibilities (512 DM Chapter 2)
- Executive Order 13175 – Consultation and Coordination with Indian Tribal Governments
- Federal Energy Policy Act of 2005
- Executive Order 11988 – Floodplain Management (1977)
- Executive Order 11990 – Protection of Wetlands (1977)
- Executive Order 12898 – Environmental Justice (1994)
- Executive Order 13007 – Indian Scared Sites (1996)
- Executive Order 11593 – Protection and Enhancement of the Cultural Environment (1971)
- Executive Order 13186 – Protection of Migratory Birds (2001) Responsibilities of Federal Agencies to Protect Migratory Birds in furtherance of the purposes of the migratory bird conventions
- Executive Order 13112 – Invasive Species
- Migratory Bird Treaty Act (16 USC 703-711)

- Bald and Golden Eagle Protection Act (16 USC 668-668d)
- Fish and Wildlife Coordination Act (16 USC 661-666c)
- Endangered Species Act of 1973 (16 USC 1531-1544)

List of Preparers

A list of individuals with primary responsibility for conducting this study, preparing the documentation, and providing technical reviews is below:

Kate Kenninger – Natural Resource Specialist – DKAO – Bismarck, North Dakota
Andrea Gue – Natural Resource Specialist – DKAO – Bismarck, North Dakota
Alicia Waters – Program Analyst – DKAO – Bismarck, North Dakota
Dani Fettig – Civil Engineer – DKAO – Bismarck, North Dakota
Randy Ehlis – Natural Resource Specialist – DKAO – Bismarck, North Dakota
Matt Cox – Archaeologist – DKAO – Bismarck, North Dakota
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Appendix A: Notice of Draft Environmental Assessment and Responses to Draft Environmental Assessment

United States Department of the Interior

BUREAU OF RECLAMATION
Great Plains Region
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

IN REPLY REFER TO:

DK-5000-16-02
ENV-6.00

AUG 17 2017

Subject: Bureau of Reclamation's Release of the Draft Environmental Assessment for the Issuance of a Water Service Contract and Power Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Dear Interested Party:

The Bureau of Reclamation in cooperation with Garrison Diversion Conservancy District (Garrison Diversion) has prepared a draft environmental assessment (EA) for the issuance of a water service contract and power contract to Garrison Diversion for the Central North Dakota Water Supply Project. Reclamation is the lead Federal agency responsible for ensuring compliance with the National Environmental Policy Act, National Historic Preservation Act, and related federal environmental and cultural resource legislation. The EA presents the Proposed Action Alternatives and evaluates the potential impacts to the human and natural environment associated with the Proposed Action Alternatives in comparison with the No Action Alternative.

Reclamation will use this draft EA and any review comments to determine whether the project will have any significant impacts on the human and natural environment. If no significant issues are identified, Reclamation would issue a Finding of No Significant Impact. If any significant issues are identified, we may consider the preparation of an Environmental Impact Statement.

Reclamation defines significance in accordance with 40 CFR 1508.27.

A digital copy of the draft EA is located at https://www.usbr.gov/gp/dkao/index.html. Hard copies of the draft EA may be obtained by calling Andrea Gue, Natural Resource Specialist, at 701-221-1223 or by requesting in writing from Area Manager, Bureau of Reclamation, P.O. Box 1017, Bismarck, North Dakota 58502.

We would appreciate your review and comments on the draft EA. The review period will be open until September 22, 2017. Comments may be submitted in writing to: Andrea Gue, Dakotas Area Office, P.O. Box 1017, Bismarck, ND 58502-1017, email ague@ubsr.gov, or by calling 701-221-1223.

Sincerely,

ARDEN FREITAG

Arden Freitag
Area Manager

United States Department of the Interior

BUREAU OF INDIAN AFFAIRS
Great Plains Regional Office
115 Fourth Avenue S.E., Suite 400
Aberdeen, South Dakota 57401

IN REPLY REFER TO:
DECRM
MC-208

SEP - 1 2017

MEMORANDUM

TO: Andrea Gue, Natural Resource Specialist, Bureau of Reclamation – Dakotas Area Office

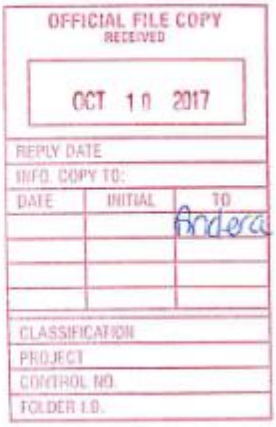
FROM: ACTING Regional Director, Great Plains Region

SUBJECT: Draft Environmental Assessment

We received your draft Environmental Assessment regarding the Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota. We have considered the potential for both environmental damage and impacts to archeological and Native American religious sites on lands held in trust by the Bureau of Indian Affairs, Great Plains Region. You should be aware; however, that tribes or tribal members may have lands in fee status near the sites of interest. These lands would not necessarily be in our databases, and the tribes should be contacted directly to be sure all concerns are recognized.

We have no environmental objections to this action, as long as the project complies with all pertinent laws and regulations. Questions regarding environmental opinions and conditions can be addressed to Marilyn Bercier, Regional Environmental Scientist, at (605) 226-7656.

We also find that the listed action will not affect cultural resources on tribal or individual landholdings for which we are responsible. Methodologies for the treatment of cultural resources now known or yet to be discovered – particularly human remains – must nevertheless utilize the best available science in accordance with provisions of the Native American Graves Protection and Repatriation Act, the Archaeological Resources Protection Act of 1979 (as amended), and all other pertinent legislation and implementing regulations. Archeological concerns can be addressed to Dr. Sebastian C. LeBeau II, Acting Regional Archaeologist, at (605) 226-7656.



October 7, 2017

Ms. Andrea Gue
Bureau of Reclamation
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

Re: Draft Environmental Assessment – Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Dear Ms. Gue:

The Coalition to Protect the Missouri River (CPMR) appreciates the opportunity to comment on the *Draft Environmental Assessment - Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota.* The CPMR, established in 2001, represents a broad base of interests throughout the lower Missouri River, including flood control, navigation, agriculture, and public energy and water utilities. We support responsible management of Missouri River resources and maintenance of congressionally authorized purposes of the river, including flood control, navigation, water quality and water supply.

To begin, we wish to thank you and the Bureau of Reclamation (Bureau) for granting an extension of the comment period on the Draft EA, as we first became aware of this document only a few days prior to the original comment period deadline. Quite frankly, we are dismayed that the Draft EA does not appear in the *Federal Register.* We are equally frustrated by the narrow scoping activity that took place as part of the Draft EA. Despite the document's assertion on page 3-7 that *"effects on reservoir levels and dam releases would likely not be measurable,"* lower river interests such as those of the CPMR should always be consulted on projects that involve diversions of water from the Missouri River mainstem. We respectfully request that for all Bureau out-of-basin water transfer projects, that a good-faith effort is made to engage all stakeholders throughout both donor and recipient basins and a full evaluation of the impacts to congressionally-authorized purposes is made.

While the CPMR empathizes with the basic human need of reliable water supply, we find the Draft EA to be woefully short on details on page 1-2 in which the document attempts to describe the "*Purpose and Need for the Proposed Action*" of supplying 20 cubic feet per second for the Central North Dakota Water Supply Project (CNDWSP). Here, the Draft EA simply states this water supply project is necessary for *"growing communities"* as requested by various local governmental agencies. We request this section of Draft EA to be revised to include specific information on population growth as documented by the U.S. Census Bureau and a clearer depiction of the ***actual*** municipal, rural, and industrial water supply needs.

The CPMR has major concerns about the potential of the CNDWSP to contribute to an out-of-basin transfer of Missouri River water to the Hudson Bay Basin. Page 1-2 of the Draft EA states that the CNDWSP will *"tie into the state-funded Red River Water Supply Project main transmission line to serve the Central North Dakota Area."* As mentioned previously, we are sincere in our concern to improve water supply for human needs after they are properly demonstrated. However, we have major concerns that this project could be part of a larger scheme to divert precious Missouri River water to another basin that ultimately flows north to Canada. Such diversions certainly do not honor congressional intent of the Missouri River's authorized purposes and we view them as a slippery slope that could harm the interests of our members.

We look forward to a revised EA by the Bureau that adequately addresses our concerns. We also request the Bureau conduct an Environmental Impact Statement for the CNDWSP due to the scope of the project. Again, thank you for the opportunity to comment on the Draft EA. Should you have any questions or comments, please do not hesitate to contact me.

Respectfully,

Dan Engemann
Executive Director
Coalition to Protect the Missouri River
519 W. 9th Street
Hermann, Missouri 65041
(573) 690-2324

Global Affairs Canada | Affaires mondiales Canada

Thursday September 21, 2017

Andrea Gue,
Dakotas Area Office,
Bureau of Reclamation
P.O. Box 1017,
Bismarck, ND
58502-1017

Email: aguc@usbr.gov

Dear Ms. Gue:

On behalf of the Government of Canada, I would like to thank you for the opportunity to provide comments on the Draft Environmental Assessment (EA) related to the Central North Dakota Water Supply Project, issued August 2017 by the U.S. Department of the Interior, Bureau of Reclamation's Dakotas Area Office.

The Government of Canada has reviewed the Draft EA and appreciates the opportunity to share concerns and request clarifications about the project and how it fits into larger inter-basin water supply projects currently being planned, or under development, by the State of North Dakota and/or the Bureau of Reclamation.

By way of background, the Government of Canada has shared its concerns about two water supply projects – the Northwest Area Water Supply Project and the Red River Valley Water Supply Project – for years. Canada's concerns about these types of water supply projects stem from the inter-basin transfer of water from the Gulf of Mexico watershed to the Hudson Bay watershed, which carries with it the threat of invasive species moving between the two watersheds. Although we understand that the geographic scope of the project lies within the State of North Dakota, Canada could face negative impacts, as once harmful invasive biota transfers across the watershed divide, Canadian waters and ecosystems would be at risk. The potential risk posed by invasive biota transferring into the Hudson Bay basin could be significant and irreversible.

According to the project description in the draft EA, the Central North Dakota Water Supply Project does not transfer water from the Missouri River across the watershed divide into the Hudson Bay basin. However, the text of the EA makes clear that the Central North Dakota Water Supply Project would be part of, or utilize, facilities associated with, the Red River Valley Water Supply Project. Planners of the Red River Valley Water Supply project envision an inter-basin transfer of water which carries with it the associated risk of the introduction of invasive species into Canadian waters.

.../2

Canada

As such, the Government of Canada, which continues to be concerned about the Red River Valley Water Supply Project, seeks clarification on the following questions related to the Central North Dakota Water Supply Project.

1. Is this project considered a potential piece, facility, or in any way a module of the Red River Valley Water Supply Project?

2. If so, at what stage of the project will the Bureau of Reclamation consider inter-basin impacts of this type of water supply project, including transboundary impacts to Canada?

3. How will the Bureau of Reclamation consider the Central North Dakota Water Supply Project and its relation to other potential water supply projects in North Dakota, including in terms of cumulative impacts?

4. The Draft EA references the Red River Valley Water Supply Project, stating that "any water service contract would be subject to environmental review" and that currently this is "too speculative to study within this EA." At what point will the Bureau of Reclamation conduct an environmental review of the water service contract needs of the Red River Valley Water Supply Project? And what type of environmental review would be conducted?

5. The State of North Dakota has taken steps to develop both the Central North Dakota Water Supply Project and the Red River Valley Water Supply Project. How do the federal and state governments plan to coordinate in order to address transboundary impacts and *Boundary Waters Treaty* implications of these projects?
    a) And could a subsequent inter-basin water diversion project draw water from infrastructure created by or used by the Central North Dakota Water Supply Project without undergoing a further federal environmental assessment?

6. Recent court orders make clear the Bureau of Reclamation is required to take a "hard look" at potential transboundary impacts of projects. How will the Bureau of Reclamation undertake this "hard look" as part of this project, which is part of a larger, inter-basin water supply project?

Thank you for the opportunity to provide comments and seek clarifications related to this Draft EA for the referenced project.

Yours sincerely,

Martin Benjamin
Director General
North America Strategy Bureau
Global Affairs Canada

Manitoba

Sustainable Development

Water Stewardship and Biodiversity Division
Box 11, 200 Saulteaux Crescent
Winnipeg MB R3W 3J3
CANADA

http://www.gov.mb.ca/sd/

October 6, 2017

Ms. Andrea Gue
Dakotas Area Office
Bureau of Reclamation
P.O. Box 1017
Bismarck North Dakota 58502-1017
E-mail: ague@usbr.gov

Dear Ms. Gue:

On behalf of the Government of Manitoba, I would like to thank you for the opportunity to provide comments on the Bureau of Reclamation's ("BOR" or "Bureau") draft Environmental Assessment ("EA") for the proposed issuance of water service and power contracts to the Garrison Diversion Conservancy District ("GDCD") for the Central North Dakota Water Supply Project ("CNDWSP").

Manitoba's interest in the CNDWSP stems from our long-standing concern with proposed projects in North Dakota to move water from the Missouri River Basin to the Hudson Bay Basin. Manitoba has consistently opposed these inter-basin water transfers because they carry an inherent risk of transferring harmful alien and invasive biota into Manitoba's waters. The risks of transferring invasive biota and the need for pre-treatment have been outlined repeatedly by Manitoba in several comments and submissions to the Bureau, including as part of National Environmental Policy Act ("NEPA") reviews of the Northwest Area Water Supply (NAWS) Project and the Bureau-sponsored version of the Red River Valley Water Supply Project ("federal RRVWSP").

To summarize these concerns, the Missouri River and Hudson Bay watersheds are unique, separate, and ecologically distinct, and have different species compositions, including pathogenic species such as bacteria, viruses, fungi, and other microscopic plant and animal

parasites. The introduction of such species into Hudson Bay Basin waters where they are not present could cause significant and irreversible damage to Manitoba's aquatic ecosystems, including Lake Winnipeg, the tenth largest freshwater lake in the world. Manitoba has further argued that if inter-basin transfers do proceed despite the inherent risks they pose, it is critical that Missouri River water be filtered and treated before it enters the Hudson Bay Basin to remove and deactivate biota. This includes the need for careful consideration of planned and unplanned pipeline releases, disposal of treatment waste, and other potential biota transfer pathways associated with the projects.

In the case of both the NAWS Project and the federal RRVWSP, Bureau-led Environmental Impact Statement processes found that these risks would constitute a significant impact, and resulted in a requirement for pre-treatment and other risk mitigation measures in the Records of Decision issued for each project. The validity of these concerns has also been widely recognized, including by the federal district court during litigation on the NAWS Project, by the International Joint Commission during its review of the original Garrison Diversion, and in the Dakota Water Resources Act of 2000, which authorized the NAWS Project and the federal RRVWSP. Moreover, as the federal district court has noted, the Bureau has agreed that invasive biota transfer in the context of inter-basin water transfers from the Missouri River Basin to the Hudson Bay Basin "could have catastrophic consequences" that would be irreversible.[1]

These concerns apply equally to the Red River Valley Water Supply Project (state RRVWSP) being advanced by the GDCD with support from the State of North Dakota, of which the proposed CNDWSP would be part. The state RRVWSP is a proposed inter-basin transfer from the Missouri River Basin to the Hudson Bay Basin in eastern North Dakota. While the CNDWSP as strictly defined in the draft EA does not directly constitute an inter-basin transfer, the sole purpose of the proposed six mile pipeline is to provide water from the Missouri River to the RRVWSP and together they will convey water into the Red River basin. The CNDWSP cannot provide water to the proposed service area or accomplish its intended goals without the RRVWSP, and would not serve a useful purpose on its own. Indeed, the CNDWSP is properly seen as a segment of the RRVWSP, and therefore it is not possible as a practical matter, or appropriate under NEPA, to consider the environmental impacts of the CNDWSP separately from those of the RRVWSP.

Despite the evident similarities between the state RRVWSP and the federal RRVWSP, and potential for significant environmental impacts found in the NEPA review processes for the federal RRVWSP, the state RRVWSP has not undergone any separate NEPA analysis. State RRVWSP proponents have explicitly sought to "[limit] contact with the federal government as

[1] *Gov't of Province of Manitoba v. Norton,* 398 F. Supp. 2d 47 (D.D.C. 2005)

much as possible,"[2] and to avoid triggering federal review requirements.[3] The GDCD has also made no commitments regarding pre-treatment of water, and is contemplating "water to water transfer" of untreated Missouri River water as one "treatment" option for the project.[4]

Moreover, although the draft EA indicates that any water service contract for an inter-basin transfer is "too speculative to study within this EA,"[5] the McClusky Canal is one of the three intake options under consideration by the GDCD for the state RRVWSP, and it is worth noting that it was the "Preferred Alternative" for the federal RRVWSP. Moreover, recent statements from GDCD officials suggest a renewed focus on the advantages of using the McClusky Canal for the RRVWSP to achieve project cost savings.[6]

The state RRVWSP is undoubtedly intended to be an inter-basin transfer, one with as yet unexamined environmental impacts in the Hudson Bay Basin. As such, from Manitoba's perspective, this clear connection between the proposed CNDWSP and the RRVWSP inter-basin water transfer project raises a number of serious questions which are not addressed in the draft EA.

First, the draft EA does not analyze the potential that Missouri River water provided by the CNDWSP may be transferred to the Hudson Bay Basin through the RRVWSP. The draft EA asserts that the CNDWSP, using RRVWSP infrastructure, will provide municipal, rural, and industrial water within the Missouri River Basin. However, the draft EA does not analyze the proposed RRVWSP infrastructure to establish that water entering that system from the CNDWSP would remain in the Missouri River Basin, whether through design or engineered controls, nor does it provide any indication of measures that would be needed to monitor, assess, or mitigate this risk. It would seem that such an analysis would be necessary to provide a full picture of the environmental impacts of the CNDWSP.

Second, several of the counties in the proposed CNDWSP service area, including McLean, Sheridan, Wells, Foster, and Stutsman Counties, straddle the divide between the Missouri River Basin and the Hudson Bay Basin. The draft EA does not assess whether existing or planned local water distribution networks that may be connected to the CNDWSP in these areas approach or encroach the boundaries of the Hudson Bay Basin, nor does it provide any indication that this issue will be monitored or addressed in the future as the CNDWSP proceeds. There is also no assessment of the potential for further distribution of untreated Missouri River

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[2] Quote from Duane DeKrey, "Large strides expected for water projects," *Bismarck Tribune*, May 22, 2017, http://bismarcktribune.com/news/local/govt-and-poiltics/large-strides-expected-for-water-projects/article_cec8c457-26b3-5caa-8561-0bf1db37929c.html

[3] CH2MHill, *Final Report, Red River Valley Water Supply Project Alternative Route Engineering Study*, June 6, 2014.

[4] Garrison Diversion Conservancy District, http://www.rrvwsp.com/features/treatment/

[5] Draft EA, 2-6

[6] "Large Strides," *Bismarck Tribune*; "Reservoir embankment's potential to collapse poses new hurdle for Red River Valley Water Supply Project," *Fargo Forum*, June 16, 2017, http://www.inforum.com/news/4284886-reservoir-embankments-potential-collapse-poses-new-hurdle-red-river-valley-water-supply

water from these local distribution systems through non-pipeline means, for example by truck from CNDWSP/state RRVWSP connected local water distribution systems. Without a clear understanding of these pathways, the risk of transferring invasive biota cannot be assessed in sufficient depth to rule out a significant environmental impact or to identify appropriate mitigation measures.

Third, the Bureau indicates that it will rely on the GDCD to operate and maintain the system, and to implement and monitor environmental commitments.[7] It is unclear from the draft EA how the Bureau will ensure that water supplied through the CNDWSP will remain in the Missouri River Basin in this context.

Fourth, the draft EA indicates that additional NEPA analysis and review may be required "if the McClusky Canal is identified as a water source for the entire 150 to 180 cfs needed for the [state] RRVWSP."[8] This must be presumed to include the environmental impacts of transferring Missouri River water to the Hudson Bay Basin. However, it is not clear how the environmental risks entailed if the McClusky Canal were to be the sole source of water for the RRVWSP are avoided if the McClusky Canal is only a partial source of water for the RRVWSP. As noted above, there is no analysis in the draft EA of whether or how transferred water will be kept within the Missouri River Basin. Even if mechanical control valves were built into the RRVWSP, something not contemplated in the draft EA but which has been suggested by GDCD officials,[9] there is no analysis in the draft EA to assess the risks entailed or the efficaciousness of any particular mitigation action.

Fifth, while there is some consideration given to the effects of climate change on water quantity and need, there may also be climate change effects on water quality that could affect the risks of transferring invasive biota through the CNDWSP/state RRVWSP, as well as the efficacy of potential mitigation measures. For example, climate change could impact the species found in the Missouri River and the climate change driven changes in constituents such as turbidity could impact the efficacy of water treatment technologies to remove invasive biota.

Sixth, while the draft EA examines potential annual depletions of the Missouri River through the CNDWSP, it does not include consideration of the cumulative impacts of depletions as a result of other inter-basin water transfers currently planned or under development. This would certainly include the state RRVWSP, as well as the NAWS Project.

Finally, Manitoba would note that any inter-basin water transfer from the Missouri River Basin to the Hudson Bay Basin, including the state RRVWSP and therefore the connected CNDWSP, would have significant environmental impacts on boundary waters within the

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[7] Draft EA, 2-2
[8] Draft EA, 2-6
[9] Duane DeKrey quoted in "$1B N.D. water supply pipeline aims to begin filing permits in 2017," *Bismarck Tribune*, December 26, 2016, http://bismarcktribune.com/b-n-d-water-supply-pipeline-aims-to-begin-filing/article_febbd841-1d35-57c7-8656-64f07c66af6f.html

meaning of the *Boundary Waters Treaty* between Canada and the United States. Article IV of the Treaty provides that "boundary waters and waters flowing across the [US-Canada] boundary shall not be polluted on either side to the injury of health or property on the other side." The Bureau has recognized in the context of other projects that the risk of biota transfer from the Missouri River Basin to the Hudson Bay Basin must be addressed if the United States is to honor its commitments in the Treaty. For the reasons outlined above, Manitoba would contend that those obligations are triggered in the case of the state RRVWSP and connected CNDWSP as well.

Given these questions and concerns, it is Manitoba's view that a "Finding of No Significant Impact" would not be warranted in this case, and would submit that the Bureau needs to undertake detailed analysis and consider mitigation of any potential environmental impacts of the CNDWSP as a result of its interdependence with the RRVWSP, specifically including the risks and consequences of transferring Missouri River water into the Hudson Bay Basin and potential effects downstream in Canada.

Again, thank you for the opportunity to comment on the draft EA for this project.

Sincerely,

Bruce Gray
Assistant Deputy Minister
Water Stewardship and Biodiversity

c: Rob Olson, Deputy Minister, Sustainable Development
Michael Richards, Deputy Cabinet Secretary and Deputy Minister, Intergovernmental Affairs
Nicole Armstrong, Director, Water Science and Watershed Management
International Joint Commission and International Red River Board Co-Chairs

Missouri Department of NATURAL RESOURCES
dnr.mo.gov
Eric R. Greitens, Governor
Carol S. Comer, Director

September 19, 2017

Ms. Andrea Gue
Bureau of Reclamation
P.O. Box 1017
Bismarck, ND 58502

Re: Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Service Project, North Dakota, Draft EA

Dear Ms. Gue:

On behalf of the Missouri Department of Natural Resources (Department), I request a 30-day extension for the Draft Environmental Assessment (Draft EA) for the *Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Service Project, North Dakota.*

The Department has consistently requested the Bureau of Reclamation (Bureau) notify us of any project developments that relate to the Missouri River. As the Bureau is well aware, the Department has been an active participant on these types of projects for many years. Even so, the Department did not receive notification of the Draft EA, or find a copy of the notification in the Federal Register. We were made aware of the Draft EA from a third party just three days prior to the close of the comment period. In light of the importance of this project and the impact it could have to Missouri, a 30-day extension is warranted to allow time for proper review and comment.

If you have any question regarding the specifics of our request, please contact Mr. Robert Bacon of my staff at 573-751-6632.

Please let me know if you intend to grant this request.

Sincerely,

DEPARTMENT OF NATURAL RESOURCES

Dru Buntin

Dru Buntin
Deputy Director

DB/ja

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REPLY DATE		
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DATE	INITIAL	TO
9/26/17	AG	Andrea
9/26/17	KK	Kirk
CLASSIFICATION		
PROJECT		
CONTROL NO.		
FOLDER I.D.		

Missouri Department of NATURAL RESOURCES
dnr.mo.gov
Eric R. Greitens, Governor
Carol S. Comer, Director

OCT 0 6 2017

Andrea Gue
Bureau of Reclamation
Dakotas Area Office
PO Box 1017
Bismarck, ND 58502

Dear Ms. Gue:

The Missouri Department of Natural Resources (Department) hereby submits its comments on the Draft Environmental Assessment (Draft EA) for the "Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota." As a preliminary matter, we would point out that the Department has asked for the Bureau of Reclamation (Bureau) to keep us apprised of any project developments concerning the diversion from the Missouri River. This request continues to go unheeded. We only became aware of the Draft EA on September 19 through a third party. Furthermore, the failure to publish the Draft EA in the *Federal Register* may well constitute a violation of the National Environmental Policy Act.

The Department has voiced strong opposition to transfers of Missouri River water to the Hudson Bay drainage basin for many years, and will continue to do so. The Bureau states that the purpose of this project is to deliver power and provide water supply to the controversial Red River Valley Water Supply Project (RRVWSP). The Department has opposed the various iterations of the federal RRVWSP project for more than thirty years (see enclosures). Providing delivery of water, power service, and land access to this inter-basin transfer is a major federal action, which requires an Environmental Impact Statement (EIS). The Bureau is also obligated to demonstrate that this project satisfies the requirements of the Boundary Waters Treaty with Canada, which is not mentioned in the Draft EA.

Purpose and Need

The Bureau has not demonstrated that there is a need for the proposed project. The Draft EA presents a general, three-sentence paragraph as its purpose and need statement. It contains no current population data or projections or a water demand analysis for the Central North Dakota Water Supply Project (CNDWSP) service area that justifies the need for 20 cubic feet per second (cfs) of water supply. The Draft EA also fails to provide alternatives to or analyze the benefits and impacts of the project, which are the essential elements of a NEPA review. The Bureau has not demonstrated a sufficient purpose and need for the project.

Project Area Description
The project area description in the Draft EA describes the location of the proposed intake along the McClusky Canal and the six mile stretch of the proposed intake and 36-inch diameter pipeline. Since the Bureau intends to deliver water from the McClusky Canal to the CNDWSP via the RRVWSP, these projects should be described as well. The Draft EA lacks maps and descriptions of the CNDWSP and RRVWSP service areas or the proposed communities that would be served by these projects. The project area description found in the Draft EA is inadequately described. There is no mention of the RRVWSP even though the plan, apparently, is to connect directly to that water distribution system.

Red River Valley Water Supply Project (RRVWSP)
The Department's long-standing concerns remain the same as with the federal RRVWSP project, since it is the apparent intention that the Bureau and Garrison Diversion Conservancy District propose to complete the project piecemeal, and mostly with state funds. The Bureau apparently intends to connect to the state-funded, inter-basin RRVWSP to deliver Missouri River water to the Red River basin. The Department has consistently opposed this concept since such transfers would reduce downstream flow support in time of drought in the Missouri River basin. Impacts to the lower Missouri River occur frequently as reservoir levels decrease early in a drought and downstream flow support is reduced. The Bureau has failed to evaluate the impacts of these actions. During the 2000-2008 drought, the Corps greatly reduced downstream flow support to the Missouri River, impacting users throughout the lower basin. As a consequence, power generation and water supplies were impacted.

Cumulative Impacts
The Bureau's Draft EA fails to consider cumulative impacts to downstream flow support. NEPA requires that the Bureau determine if the proposed action has significant environmental effects, and that the Bureau consider the environmental and related social and economic effects of their proposed actions. It is imperative that the Bureau conduct a cumulative impact analysis for the proposed project, which links to the highly contentious RRVWSP. In conducting its cumulative impact analysis, the Bureau must consider all past, present, and reasonably foreseeable actions.

Summary
We urge the Bureau to rescind the Draft EA and commit to a full investigation of the water resources within the Red River Valley. In doing so, the Bureau should work cooperatively with the states of Minnesota and North Dakota as well as the Province of Manitoba to explore in-basin options that fulfill the water supply needs of the Red River Valley. One such opportunity is the flood control diversion project for the City of Fargo which the Corps of Engineers is exploring. This particular project could easily incorporate water supply storage to address the additional water supply needs of the Red River Valley.

We would appreciate the Bureau's careful consideration of these comments on the Draft EA. If you have questions regarding our comments, please contact Bob Bacon at 573-751-6632.

Sincerely,

DEPARTMENT OF NATURAL RESOURCES

Dru Buntin
Deputy Director

DB:bb

Enclosures

Gue, Andrea <ague@usbr.gov>

Draft EA for Water Service Contract and Power Contract to Garrison Diversion Conservancy District for the Central ND Water Supply Project

Humann, Michael T. <mhumann@nd.gov> Fri, Aug 25, 2017 at 7:58 AM
To: "ague@usbr.gov" <ague@usbr.gov>

Andrea,

We have reviewed the draft EA for the above described project and find that the current pipeline route will cross the SW4-24-144-78 Burleigh County which is State School Trust Land. Please be aware an easement will need to be obtained prior to construction from the North Dakota Department of Trust Lands should this project be approved and the before mentioned State School Trust Land remain part of the project. Applications must be submitted on-line using the electronic application form found on the department of Trust Lands website (https://land.nd.gov/SurfaceROW/RightOfWay). Please be aware there is a review process which considers many factors (environmental, financial benefit to the trust etc.) prior to approval. Let me know if you have any questions. Thank you

Michael Humann

Surface Division Manager, CPRM

ND Department of Trust Lands

PO Box 5523

Bismarck ND 58506-5523

PH: (701)328-1917

email: mhumann@nd.gov

NORTH DAKOTA
DEPARTMENT of HEALTH

ENVIRONMENTAL HEALTH SECTION
Gold Seal Center, 918 E. Divide Ave.
Bismarck, ND 58501-1947
701.328.5200 (fax)
www.ndhealth.gov

August 29, 2017

Ms. Andrea Gue
U.S. Bureau of Reclamation
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502

Re: Draft Environmental Assessment for the Issuance of a Water Service Contract and Power Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, Burleigh County

Dear Ms. Gue:

This department has reviewed the information concerning the above-referenced project submitted under date of August 17, 2017, with respect to possible environmental impacts.

This department believes that environmental impacts from the proposed construction will be minor and can be controlled by proper construction methods. With respect to construction our comments remain the same as those in our December 5, 2016 letter included in the draft environmental assessment.

If you have any questions regarding our comments, please feel free to contact this office.

Sincerely,

L. David Glatt, P.E., Chief
Environmental Health Section

LDG:cc

North Dakota Department of Transportation

Thomas K. Sorel
Director

Doug Burgum
Governor

September 6, 2017

Arden Freitag
Acting Area Manager
US Department of Interior
P.O. Box 1017
Bismarck, ND 58502-1017

DRAFT EA FOR ISSUANCE OF A WATER SERVICE AND POWER CONTRACT TO GARRISON DIVERSION CONSERVANCY DISTRICT, BURLEIGH COUNTY, NORTH DAKOTA

We have reviewed your August 17, 2017, letter.

This project should have no adverse effect on the North Dakota Department of Transportation highways.

However, if because of this project any work needs to be done on highway right of way, appropriate permits and risk management documents will need to be obtained from the Department of Transportation District Engineers, Larry Gangl at 701-328-6955.

Robert Fode

ROBERT A. FODE, P.E., DIRECTOR – OFFICE OF PROJECT DEVELOPMENT

57/raf/js
c: Larry Gangl, Bismarck District Engineer

608 East Boulevard Avenue • Bismarck, North Dakota 58505-0700
Information: 1-855-NDROADS (1-855-637-6237) • FAX: (701) 328-0310 • TTY: 711 • dot.nd.gov

North Dakota State Water Commission

900 EAST BOULEVARD AVENUE, DEPT 770 • BISMARCK, NORTH DAKOTA 58505-0850
(701) 328-2750 • TTY 1-800-366-6888 or 711 • FAX (701) 328-3696 • http://swc.nd.gov

September 15, 2017

Arden Freitag
US Department of the Interior
Bureau of Reclamation
Dakota Area Office
PO Box 1017
Bismarck, ND 58502-1017

Dear Mr. Freitag:

This is in response to your request for a review of the environmental impacts associated with the Water Service Contract and Power Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota.

The proposed project has been reviewed by State Water Commission staff, and the following comments are provided:

- No permits relative to the NFIP are required based on the current effective FIRM and state minimum standards.

- Initial review indicates the project does not require a conditional or temporary permit for water appropriation. However, if surface water or groundwater will be diverted for construction of the project, a water permit will be required per North Dakota Century Code (NDCC) § 61-04-02. Please consult with the Water Appropriations Division of the Office of the State Engineer (OSE) at 701-328-2754 or waterpermits@nd.gov if you have questions.

- The OSE Engineering and Permitting Section reviewed the project route and determined that the project route traverses over or through surface water resources, such as identified ponds, sloughs, or lakes (i.e. wetlands). The OSE requests that a surface drain application (enclosed) be submitted if any ponds, sloughs, lakes, or any series thereof are impacted by the project and have a watershed area of 80 acres or more. The OSE also requests to be notified regarding the proposed project's impacts, if any, to water resources such as watercourses (i.e. streams or rivers), drains, and wetlands (i.e. ponds, sloughs, lakes, or any series thereof) as any alterations, modifications, improvements, or impacts to those water resources may require a drainage permit(s) or a construction permit(s) from the OSE. For further information on the OSE's permitting requirements, please visit the Regulation & Appropriations tab on the OSE's website (swc.nd.gov). Please contact the OSE Engineering and Permitting Section at 701-328-2752 if you have questions.

Thank you for the opportunity to provide review comments. If you have any questions, please call me at 701-328-4967.

Sincerely,

Jared Huibregtse

Jared Huibregtse
Water Resource Planner IV

JH:dm/1570

APPLICATION FOR SURFACE DRAIN
OFFICE OF THE STATE ENGINEER
Water Development Division
SFN 2830 (8/11)

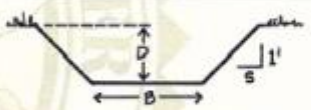
DATE RECEIVED BY OFFICE OF THE STATE ENGINEER

I, the undersigned, am applying for a permit under NDCC Section 61-32-03, to drain a pond, slough, lake, or sheetwater, or any series thereof, which has a watershed area comprising 80 acres or more.

No._____ (OSE USE ONLY)

This application must be accompanied by FSA aerial photos or equivalent showing the location of the proposed drain(s).

(1)	WATER RESOURCE DISTRICT IN WHICH PROJECT IS LOCATED:				
(2)	LEGAL DESCRIPTION - DRAIN CENTERLINE: [use separate sheet(s) if necessary]	1/4	SECTION	TOWNSHIP	RANGE
		1/4	SECTION	TOWNSHIP	RANGE
		1/4	SECTION	TOWNSHIP	RANGE
(3)	LEGAL DESCRIPTION - DRAIN OUTLET:	1/4 1/4	SECTION	TOWNSHIP	RANGE
(4)	PURPOSE:				
(5)	Drain Method: ☐ Pumping ☐ Filling ☐ Gravity				
(6)	DESCRIPTION OF AREA TO BE DRAINED:				
	TOTAL Drainage Area Acres		Project Drainage Area Acres		
	Water Area Acres		Average Depth of Water Feet		
(7)	DESCRIPTION OF DRAIN:				
	Pumping Rate (if applicable) gpm cfs		Fill Volume (if applicable) cubic yards	Bottom Width (B)	Feet
	TOTAL Length of Drain Feet		Length of Drain Project Feet	Side Slopes (S)	:1 Foot
(8)	Anticipated completion date:		(9) Assessment drain? ☐ YES ☐ NO	Maximum Cut (D)	Feet
(10)	Do you own the land to be drained in fee? ☐ YES ☐ NO		If NO, give the name and address of the legal landowner(s):		



The filing of this application and its approval does not relieve the applicant and/or landowner(s) from any responsibility or liability for damages resulting from the construction, operation or failure of this drain.

APPLICANT'S CERTIFICATION

I understand that I must undertake and agree to pay the expense incurred in making an investigation. If the investigation discloses that the quantity of water to be drained will flood or adversely affect downstream lands, I will be required to obtain flowage easements and must file the easements in the office of the county recorder before a permit may be issued. My signature below acknowledges that I have read and agree to these statements, and will adhere to the conditions given on the back of this application.

NAME (PRINT OR TYPE):	DATE SUBMITTED:
ADDRESS:	PHONE NO:
CITY, STATE, ZIP CODE:	
SIGNATURE (Owner of the land on which the project is located or legal entity sponsoring project):	

FOR USE BY WATER RESOURCE DISTRICT AND STATE ENGINEER

☐ The Water Resource District Board has investigated according to NDAC Section 89-02-01-09.2.

☐The proposed drainage (☐ will ☐ will not) flood or adversely affect lands of downstream landowners.

This application is hereby:

☐ Denied Signature: _____
Chairman or Secretary of Water Resource District Board

☐ Approved Date: _____

(1) The State Engineer or Water Resource District Board may revoke or modify the project and the rights granted under the permit to protect the public health, safety, and welfare; to protect property; or to ensure the orderly control of water resources.

(2) Construction must be completed within two years from the date of final approval.

This application:

☐ does Involve drainage of state-wide or Interdistrict significance

☐ does not involve drainage of state-wide or interdistrict significance

If the State Engineer has determined that this application does not involve drainage of state-wide or Interdistrict significance, approval by the Water Resource District Board constitutes a permit to drain.

If the State Engineer has determined that this application involves drainage of state-wide or interdistrict significance, approval by both the Water Resource District Board and the State Engineer must be given to constitute a permit to drain.

This application involving drainage of state-wide or interdistrict significance is:

☐ Denied Signature: _____
State Engineer

☐ Approved Date: _____

CONDITIONS:

(1) The State Engineer may revoke or modify the project and the rights granted under the permit to protect the public health, safety, and welfare; to protect property; or to ensure the orderly control of water resources.
(2) Construction must be completed within two years from the date of final approval.

Mail to:

Office of the State Engineer
900 East Boulevard Avenue, Dept 770
Bismarck, ND 58505

Appendix B: Notice of Draft Revised Environmental Assessment, Responses to Draft Revised Environmental Assessment and Reclamation's Responses

United States Department of the Interior

BUREAU OF RECLAMATION
Great Plains Region
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

IN REPLY REFER TO:

DK-5000-16-02
ENV-6.00

APR 17 2018

Subject: Bureau of Reclamation's Release of the Revised Draft Environmental Assessment for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Dear Interested Party:

The Bureau of Reclamation in cooperation with Garrison Diversion Conservancy District (Garrison Diversion) has prepared a revised draft environmental assessment (EA) for the issuance of a water service contract to Garrison Diversion for the Central North Dakota Water Supply Project (CNDWSP). Reclamation is the lead Federal agency responsible for ensuring compliance with the National Environmental Policy Act, National Historic Preservation Act, and related federal environmental and cultural resource legislation. The draft EA released in August 2017 was revised to clarify several aspects of the project and to address comments received on that draft. Additionally, Garrison Diversion was made a cooperating agency in the revised draft EA process due to their expertise on the CNDWSP information and data necessary to complete revisions. The EA presents the Proposed Action Alternatives and evaluates the potential impacts to the human and natural environment associated with the Proposed Action Alternatives in comparison with the No Action Alternative.

Reclamation will use this draft EA and any review comments to determine whether the project will have any significant impacts on the human and natural environment. If no significant issues are identified, Reclamation would issue a Finding of No Significant Impact. If any significant issues are identified, we may consider the preparation of an Environmental Impact Statement.

Reclamation defines significance in accordance with 40 CFR 1508.27.

A digital copy of the draft EA is located at https://www.usbr.gov/gp/dkao/index.html. Hard copies of the draft EA may be obtained by calling Kate Kenninger, Natural Resource Specialist, at 701-221-1282 or by requesting in writing from Area Manager, Bureau of Reclamation, P.O. Box 1017, Bismarck, North Dakota 58502.

Subject: Bureau of Reclamation's Release of the Revised Draft Environmental Assessment for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

We would appreciate your review and comments on the draft EA. The review period will be open until May 2, 2018. Comments may be submitted in writing to: Kate Kenninger, Dakotas Area Office, P.O. Box 1017, Bismarck, ND 58502-1017, email kkenninger@ubsr.gov, or by calling 701-221-1282.

Sincerely,

ARDEN FREITAG

Arden Freitag
Area Manager

bc: DK-1000 (Freitag, Hall), DK-2000 (Waters, Fettig), DK-5000 (Kenninger, Reinhart)
(via electronic copy)

WBR:Kenninger:Vinchattle:04/16/2018:701-221-1282
V:\Public\NEPA\Central ND Water Supply\Rev DraftEA\Notice\PUBLICNOTICE-DEA.docx

Missouri Department of NATURAL RESOURCES
dnr.mo.gov
Eric R. Greitens, Governor
Carol S. Comer, Director

APR 2 5 2018

Ms. Kate Kenninger
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

Re: Revised Draft EA for the Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Dear Ms. Kenninger:

On behalf of the Missouri Department of Natural Resources, I request a 30 day extension of the comment period for the Revised Draft Environmental Assessment (Revised Draft EA) for the *Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Service Project, North Dakota* until at least June 2, 2018.

Even though the Revised Draft EA was released on April 17, 2018 we did not receive notice until April 23. With a comment period deadline of May 2, that provides a mere nine days to review and comment on an important document to which the Department provided substantial comments. As stated in our comments on the Draft EA, the Department has significant concerns regarding the Central North Dakota Water Supply Project. We believe this extension request is appropriate and necessary to allow us to understand the extent to which the Bureau of Reclamation has addressed Missouri's concerns in the Revised Draft EA.

If you have any question regarding the specifics of our request, please contact Ms. Karen Rouse at (573) 751-0648.

Please let me know if you intend to grant this request.

Thank you for your consideration.

Sincerely,

DEPARTMENT OF NATURAL RESOURCES

Dru Buntin
Deputy Director

DB/krm

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United States Department of the Interior

BUREAU OF RECLAMATION
Great Plains Region
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

IN REPLY REFER TO:

DK-5000-16-02
ENV-6.00

APR 27 2018

Subject: Review Period Extension for the Bureau of Reclamation's Release of the Revised Draft Environmental Assessment (EA) for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota

Dear Interested Party:

The Bureau of Reclamation in cooperation with Garrison Diversion Conservancy District (Garrison Diversion) has prepared a revised draft EA for the issuance of a water service contract to Garrison Diversion for the Central North Dakota Water Supply Project (CNDWSP). Reclamation is the lead Federal agency responsible for ensuring compliance with the National Environmental Policy Act, National Historic Preservation Act, and related federal environmental and cultural resource legislation.

Reclamation will use this draft EA and any review comments to determine whether the project will have any significant impacts on the human and natural environment. If no significant issues are identified, Reclamation would issue a Finding of No Significant Impact (FONSI). If a FONSI is issued, pursuant to 40 CFR 1501.4, the FONSI would also be available for a 30-day public review. If any significant issues are identified, Reclamation may consider the preparation of an Environmental Impact Statement. Reclamation defines significance in accordance with 40 CFR 1508.27.

A digital copy of the draft EA is located at https://www.usbr.gov/gp/dkao/index.html. Hard copies of the draft EA may be obtained by calling Kate Kenninger, Natural Resource Specialist, at 701-221-1282 or by requesting in writing from Area Manager, Bureau of Reclamation, P.O. Box 1017, Bismarck, North Dakota 58502.

The review period has been extended by 15 days and will now end on May 17, 2018. Comments may be submitted in writing or verbally to: Kate Kenninger, Dakotas Area Office, P.O. Box 1017, Bismarck, ND 58502-1017, email kkenninger@ubsr.gov, or by calling 701-221-1282.

Sincerely,

ARDEN FREITAG

Arden Freitag
Area Manager

CARRINGTON
the central city

May 14, 2018

Ms. Kate Kenninger
Dakotas Area Office, Bureau of Reclamation
PO Box 1017
Bismarck, ND 58502-1017

Dear Ms. Kenninger-

The City of Carrington anxiously awaits access to a supplemental water supply from the Central North Dakota Water Supply Project. I am writing to let the Bureau of Reclamation know that Carrington strongly supports the Garrison Diversion Conservancy District's request to withdraw up to 20 cfs of water from the McClusky Canal.

Carrington, which is in Foster County, is just one of the many cities and water systems that will benefit from the economic development opportunities afforded by access to a supplemental water supply. In addition to Foster County, areas of Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties would also benefit.

In order for our city to continue to grow and prosper over the long term, Carrington needs a reliable source of water to attract new businesses and industry, as well as retain local businesses and industry. Without an adequate water supply, our City's business and industrial growth will be restricted.

Please grant Garrison Diversion's request to withdraw water from the McClusky Canal for the Central North Dakota Water Supply Project. We believe our future success depends on access to water through this much-needed project.

Sincerely,

Mayor Neil Fandrich

Mayor Fandrich

CITY OF CARRINGTON PO Box 501 Carrington, ND 58421 *(p)* 701.652.2911 *(f)* 701.652.1433 www.carringtonnd.com

Kenninger, Kate <kkenninger@usbr.gov>

[EXTERNAL] CNDWSP Comments - Revised EA

1 message

Dan Engemann <danengemann05@gmail.com> Thu, May 17, 2018 at 4:07 PM
To: kkenninger@usbr.gov

Dear Ms. Kenninger:

The Coalition to Protect the Missouri River (CPMR) appreciates the opportunity to comment on the *Revised Draft Environmental Assessment - Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota.* The CPMR, established in 2001, represents a broad base of interests throughout the lower Missouri River, including flood control, navigation, agriculture, and public energy and water utilities. We support responsible management of Missouri River resources and maintenance of congressionally authorized purposes of the river, including flood control, navigation, water quality and water supply.

We sincerely appreciate the opportunity to once again provide comments, as well as the extension granted by the Bureau of Reclamation (Bureau). Based upon our review of the revised draft environmental assessment (EA), we offer the following comments:

1. In our previous comment letter, we requested a revised EA that includes specific information on population growth, as documented the U.S. Census Bureau. The EA does not include any information to fulfill this request. While the Bureau takes a step forward in providing further information in Table 1 of the EA (Central North Dakota Water Supply Nomination Information), the document still misses the mark, as the table only provides a listing of *"potential industrial activities."* As we have mentioned previously, the Bureau needs to provide a clearer depiction of **actual** water needs.

2. The revised EA does nothing to alleviate our concerns about the potential of the Central North Dakota Water Supply Project (CNDWSP) to contribute to an out-of-basin transfer

of Missouri River water to the Hudson Bay Basin. Again, we wish to be on the record with the Bureau that proposed diversions such as the CNDWSP do not honor

congressional intent of the Missouri River's authorized purposes and can cause harm to our members.

3. We stand by our previous request for the Bureau to conduct a new and separate Environmental Impact Statement for this project, in order for a full range of alternatives to be evaluated and for further input from Missouri River basin stakeholders and other interested parties. It is our belief the CNDWSP should not move forward until this critical step is completed.

Again, thank you for the opportunity to comment on the revised EA. Should you have any questions or comments, please do not hesitate contact me.

Respectfully,

Dan Engemann

Executive Director

Coalition to Protect the Missouri River

519 W. 9th Street

Hermann, Missouri 65041

(573) 690-2324

Global Affairs Canada | Affaires mondiales Canada

May 16, 2018

Ms. Kate Kenninger
Dakotas Area Office
U.S. Bureau of Reclamation
P.O. Box 1017
Bismarck, North Dakota
58502-1017

Email: kkenninger@usbr.gov

Dear Ms. Kenninger:

Thank you for the April 27, 2018 letter regarding the Bureau of Reclamation's (Bureau) revised draft Environmental Assessment (EA) for the Central North Dakota Water Supply Project (CNDWSP). The Government of Canada has reviewed the revised draft EA and appreciates the opportunity to share our ongoing concerns about the project, particularly how it relates to other inter-basin water supply projects currently under development by the State of North Dakota and the Bureau of Reclamation.

The Government of Canada continues to be concerned about the inter-basin transfer of water from the Missouri River to the Hudson Bay basin due to the threat of invasive species or other harmful biota moving between the two watersheds. Canadian waters could be negatively affected once harmful biota is transferred across the watershed divide, putting Canadian ecosystems at risk.

Within the context of the revised draft EA, the CNDWSP does not constitute a direct inter-basin transfer. However, the project description in the revised draft EA indicates the CNDWSP would be part of, or utilize facilities associated with, the Red River Valley Water Supply Project (RRVWSP) by connecting it to the McClusky Canal. Therefore, the Government of Canada firmly believes that the CNDWSP is an essential component of the RRVWSP, enabling the transfer of water from the Missouri River across the continental divide into the Hudson Bay basin. As such, it is insufficient to assess environmental and cumulative effects of the CNDWSP in isolation from the broader RRVWSP.

The Environmental Impact Statement (EIS) for the RRVWSP demonstrated significant risks posed by inter-basin transfers. However, the revised draft EA for the CNDWSP does not consider or assess the cumulative impacts of the CNDWSP, and therefore provides no indication of measures to be implemented to mitigate the associated risks. It is the failure to assess cumulative impacts and to provide mitigation proposals that gives rise to the Government of Canada's concerns.

The Government of Canada is again asking the Bureau for clarification on the following questions related to the CNDWSP:

1. The revised draft EA makes clear that the CNDWSP would be part of the RRVWSP. How, and at what point, will the Bureau consider the inter-basin impacts of the CNDWSP impacts on Canada?
2. How will federal and state governments coordinate efforts in order to address transboundary impacts and *Boundary Waters Treaty* implications of these projects in accordance with the 1977 recommendation of the International Joint Commission related to the water diversion projects associated with the Garrison Diversion?
3. How will the Bureau closely examine the cumulative effects and broader impacts of the CNDWSP as a component of the larger inter-basin RRVWSP project?
4. What type of treatment will be put in place for Missouri River basin water before it enters the Hudson Bay basin?

As noted, the RRVWSP, of which the CNDWSP is an essential component, envisions an inter-basin water transfer that carries the risk of introducing invasive species into Canadian aquatic ecosystems. Therefore, we also strongly recommend that the Bureau conduct an EIS for the CNDWSP due to its connection to the larger inter-basin RRVWSP.

We look forward to your response regarding our ongoing concerns and specifically how potential transboundary impacts will be addressed.

Yours sincerely,

Kevin S. Thompson
Director General
North America Strategy Bureau
Global Affairs Canada

Manitoba

Sustainable Development

Water Stewardship and Biodiversity Division
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CANADA

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May 17, 2018

Ms. Kate Kenninger
Dakotas Area Office
Bureau of Reclamation
P.O. Box 1017
Bismarck, North Dakota 58502-1017
E-mail: kkenninger@usbr.gov

Dear Ms. Kenninger:

On behalf of the Government of Manitoba, I would like to thank you for the opportunity to provide comments on the Bureau of Reclamation's ("BOR" or "Bureau") revised draft Environmental Assessment ("EA") for the proposed issuance of water service and power contracts to the Garrison Diversion Conservancy District ("GDCD") for the Central North Dakota Water Supply Project ("CNDWSP").

It is our intent that the present submission be read in conjunction with Manitoba's comments regarding the original draft EA issued by the Bureau in August 2017, as submitted by Manitoba on September 21, 2017. Our earlier comments outline in greater detail Manitoba's long-standing concerns with attempts to establish inter-basin water transfers from the Missouri River Basin to the Hudson Bay Basin in North Dakota, and the associated risk of transferring harmful alien and invasive biota to Manitoba's waters. As noted in that document, the validity and seriousness of these concerns has been well-established and previously recognized by the Bureau.

It remains our view, based on the revised draft EA, that the CNDWSP cannot be considered separately from the State-sponsored Red River Valley Water Supply Project (RRVWSP) in terms of purpose, infrastructure, or potential environmental impacts. The RRVWSP is explicitly intended as an inter-basin transfer, with all of the attendant risks that such

a transfer would carry. The CNDWSP, as described, would rely completely on the RRVWSP both to distribute federal water, and, crucially, to limit distribution of that water to the Missouri River basin.[1]

Despite the claim voiced in the revised draft EA's Introduction that it "included a discussion of the infrastructure/controls included to keep Missouri River water for the Proposed Action within the Missouri River Basin,"[2] there is still no analysis to establish that water entering that system from the CNDWSP could or would remain in the Missouri River Basin once it enters the RRVWSP pipeline system. The revised draft EA limits itself to noting that "[North Dakota] agreed to limit distribution of the 20 cfs to the identified in-basin communities in need,"[3] and that conditions of any water services contract "would include maintaining use of the proposed 20 cfs in the Missouri River Basin."[4] However, the discussion of controls and metering simply asserts, without explanation, that the quantity of water withdrawn from the McClusky Canal through the CNDWSP would be limited to "the combined demands of project users within the Missouri River basin, up to a maximum of 20 cfs."[5] Needless to say, water withdrawn through the CNDWSP would be mingled with waters withdrawn from the Missouri River directly in the RRVWSP pipeline – waters intended for both in-basin and inter-basin use – and nothing in the revised draft EA explains how the CNDWSP could avoid contributing to an inter-basin water transfer in these circumstances. Further, the revised draft EA makes no exploration of measures that would be needed to monitor, assess, or mitigate the risks of such a transfer.

In short, nothing has been added to the revised draft EA to demonstrate that the potential environmental impacts of the CNDWSP can be meaningfully separated from those of the RRVWSP, nor to alter the fact that the CNDWSP is inextricably linked to a proposed inter-basin water transfer project and its attendant environmental risks. Any claim that the potential environmental impacts of the CNDWSP do not encompass the risks associated with an inter-basin transfer inherent to the RRVWSP, and any similar claim that the CNDWSP will not affect boundary waters within the meaning of the Boundary Waters Treaty, rest on this unsubstantiated assertion.

We would also note that the revised draft EA still does not assess the existing or planned local water distribution networks that may be connected to the CNDWSP in the proposed service area, or the potential for further distribution of untreated Missouri River water via these local distribution systems through non-pipeline means.

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[1] Revised Draft EA, 2-7.
[2] Revised Draft EA, 1-1.
[3] Revised Draft EA, 1-6.
[4] Revised Draft EA, 2-2.
[5] Revised Draft EA, 2-6, 2-7

In addition to the substantive concerns noted above and previously, the revised draft EA has a number of other serious National Environmental Policy Act (NEPA) deficiencies. This includes failure to analyze connected actions that directly impact the CNDWSP, or to address cumulative impacts associated with the Project and other related actions by federal and non-federal agencies, as well as failure to recognize permit requirements under section 404 of the Clean Water Act and section 10 of the Rivers and Harbors Act.

In that regard, the revised draft EA errs in suggesting that "[t]here are no connected actions requiring additional analysis in this EA."[6] To the contrary, under 40 C.F.R. § 1508.25 the CNDWSP and RRVWSP are clearly "connected" actions. Although the Bureau suggests that "The state-sponsored RRVWSP will proceed independent of the proposed CNDWSP and does not need approvals from Reclamation," that scenario is far from certain. Rather, North Dakota's current plan (a plan designed for the specific purpose of avoiding NEPA review) could come to fruition only if state and local sources are able to fund the RRVWSP's estimated cost of $1.065 billion (thus far North Dakota has only appropriated $30 million). In short, there is no certainty that the CNDWSP will proceed as a state- and local-only project. Moreover, and at least equally important, the question for analysis under this EA is not whether the proposed RRVWSP could proceed independent of the CNDWSP, but rather the reverse: whether the CNDWSP could proceed independent of the RRVWSP. Clearly, it cannot. The federal action of deciding whether or not to grant a permit for the Missouri River intake and discharge for the RRVWSP is a precondition to the CNDWSP's very existence. Put another way, the CNDWSP has no independent utility, no life of its own, and it is simply illogical to assess the CNDWSP in isolation from the RRVWSP.

The revised draft EA also disregards well-established NEPA requirements for consideration of cumulative impacts, see 40 C.F.R. § 1508.7, as evidenced by the statement that North Dakota "agreed to limit distribution of the 20 cfs [from the CNDWSP] to the identified in-basin communities in need."[7] As noted above, North Dakota and the local authorities sponsoring the RRVWSP have not proposed how the project would segregate the CNDWSP's 20 cfs from the RRVWSP's 165 cfs and restrict the former's use to the Missouri River Basin. In reality, both water supplies will combine and cross the continental divide into the Hudson Bay Basin, compounding the aquatic invasive species risk that Manitoba already faces due to the NAWS Project. Courts emphasize the importance of considering cumulative impacts of this type in Environmental Assessments.

Finally, the Bureau's approval of a water services contract for the CNDWSP cannot move forward without a Corps of Engineers permit under section 404 of the Clean Water Act to construct intake facilities along the McClusky Canal, which will require significant dredge and fill operations. Construction of the RRVWSP intake on the Missouri River will require permits

[6] Revised Draft EA, 1-6.
[7] Revised Draft EA, 1-6.

under both section 404 as well as section 10 of the Rivers and Harbors Act due to impacts to wetlands, navigable waters, or both, and each statute requires NEPA compliance as a prerequisite to permit issuance. For that reason, such permits are "connected actions" under NEPA, specifically, 40 C.F.R. 1508.25(a)(1)(ii). Put another way, analysis of the environmental impact of the construction and placement of the Project's intake facilities cannot be left to a later date and, instead, must be addressed in the EA as a "connected" federal action, analysis of which is a prerequisite to Project approval.

Given these concerns, it is Manitoba's view that a "Finding of No Significant Impact" would not be warranted in this case, and we would submit that the Bureau has thus far failed to evaluate the potential environmental impacts of the CNDWSP through its inextricable connections to the RRVWSP, including the risks and consequences of transferring Missouri River water into the Hudson Bay Basin, both in the United States and downstream in Canada. We would further recommend that the Bureau undertake a full Environmental Impact Statement for this project.

Again, thank you for the opportunity to comment on the revised draft EA for the CNDWSP.

Sincerely,

Lori Stevenson
A/Assistant Deputy Minister
Water Stewardship and Biodiversity

c: Rob Olson, Deputy Minister, Sustainable Development
Nicole Armstrong, Director, Water Science and Watershed Management
Elliott Brown, Assistant Deputy Minister, International Relations
International Joint Commission and International Red River Board Co-Chairs

Missouri Department of NATURAL RESOURCES
dnr.mo.gov
Eric R. Greitens, Governor
Carol S. Comer, Director

May 17, 2018

Ms. Kate Kenninger
Bureau of Reclamation
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502

Dear Ms. Kenninger:

The Missouri Department of Natural Resources hereby submits its comments on the Revised Draft Environmental Assessment (Draft EA) for the "Issuance of Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, North Dakota."

The Bureau of Reclamation (Bureau) still has not conducted a sufficient analysis of environmental impacts in the Revised Draft EA. Therefore, the Bureau should complete an Environmental Impact Statement (EIS) to take a "hard look" as required by the National Environmental Policy Act (NEPA). An EIS would also include an earnest examination of the purpose and need for the project, a sincere exploration of viable alternatives, and active participation from all interested parties especially those that have voiced concerns about the impacts of the project.

The Bureau neglected to address the State of Missouri's opposition to the depletions analysis and the cumulative impacts thereof. The Bureau points towards the depletions analysis for the 2013 Northwest Area Water Supply Supplemental Environmental Impact Statement (NAWS SEIS) as being sufficient for the Revised Draft EA. The 2013 report, however, is based largely on the Bureau's 2005 report, "*A Study to Determine Historic and Present-Level Streamflow Depletions in the Missouri River basin for the Period 1929 to 2002.*" The Bureau admits in the 2005 report that it contains critical shortcomings which the State of Missouri addressed in our September 2013 comments on the NAWS Draft SEIS (enclosed). It is true now, as it was then, that the report's many limitations were due to time constraints, many which could have been resolved in the intervening years. The 2013 depletions analysis and associated cumulative impacts analysis on which the Bureau now relies for the 2018 Revised Draft EA is flawed and incomplete.

The Bureau has yet to provide adequate rationale for the need for the project. Simply providing a table of prospective users and projected demands without explanation of the assumptions being made does not allow for a vetting of the purpose and need for the project as required by NEPA. Nor is the source of the scant water demand projections included in the Revised Draft EA.

The Department remains opposed to the interbasin transfer of water from the Missouri River basin to the Hudson Bay basin. The Bureau now states that the purpose of the project is to determine "…the eligibility of Garrison Diversion to receive Pick-Sloan Missouri Basin Program (Program) preference power and a water service contract for 20 cfs from the Canal as an alternative source for the portion of the Proposed Project that would utilize water within the Missouri River Basin." It is immaterial that the Bureau asserts that the water from the McClusky Canal (a federally constructed canal) would remain within the Missouri River basin. The Bureau, in conjunction with the Garrison Diversion Conservancy District (GDCD), is attempting to validate the project as a whole by presenting the project piecemeal. The Bureau's seemingly pre-decisional approach to assuming the project's validity is likely a violation of NEPA.

Furthermore, stating the water delivered to the state-funded Red River Valley Water Supply Project (RRVWSP) would remain in the Missouri River basin does not alleviate concerns related to the Boundary Waters Treaty. Installing meters along the route of the state-funded RRVWSP cannot physically prevent an interbasin transfer of water or biota. A separate and distinct water distribution system which is contained within the Missouri River basin should be utilized if the Bureau and the GDCD truly intend to retain water within the Missouri River basin while also delivering water to Central North Dakota.

We would appreciate the Bureau's careful consideration of these comments on the Revised Draft EA. If you have questions regarding our comments, please contact Ms. Karen Rouse with the Department's Water Resources Center, P.O. Box 176, Jefferson City, MO 65101 or by phone at 573-751-0648.

Sincerely,

DEPARTMENT OF NATURAL RESOURCES

Dru Buntin
Deputy Director

DB:bbm

Enclosures

STATE OF MISSOURI
Jeremiah W. (Jay) Nixon, Governor • Sara Parker Pauley, Director
DEPARTMENT OF NATURAL RESOURCES
www.dnr.mo.gov

September 9, 2013

Ms. Alicia Waters
Bureau of Reclamation
P.O. Box 1017
Bismarck, ND 58502

Dear Ms. Waters:

The Missouri Department of Natural Resources (Department) appreciates the opportunity to comment, but before we begin let us communicate our disappointment. We formally requested in our October 8, 2010 letter to *"be included on all communications associated with this SEIS and invited to all meetings between the Bureau and other agencies."* We are discouraged and concerned that our request was ignored. Regardless, we submit the following comments on the Northwest Area Water Supply (NAWS) Draft Supplemental Environmental Impact Statement (Draft SEIS).

The Department has strongly opposed the inter-basin transfer of Missouri River water to the Hudson Bay drainage basin in each of our past comments, which are attached for your reference. Unfortunately, the Bureau of Reclamation (Bureau) selected a Preferred Alternative in this Draft SEIS which utilizes the Missouri River to provide water supply to the Souris River basin without clear justification for its rationale.

First of all, the Bureau has not demonstrated that there is an actual need for this inter-basin transfer given the current and estimated future demand. The Bureau presents flawed population projections, overestimates water demands and ultimately fails to justify the Preferred Alternative. The Bureau relies on anecdotal evidence to substantiate its conclusions regarding population growth and fails to provide any data for the population increase. County-level population projections and water service area population in the Water Needs Assessment report indicate a disproportionate increase in water demand for only a very small population increase. In providing water supply for a net increase of 492 people across the 10 County-region over 50 years, $207 million would be expended for construction and $550 million ($11 million per year over 50 years) for Operation and Maintenance. In other words, the Bureau proposes to spend

$757 million to provide water for a net increase of 1 person per county per year (Net increase of 492 people/10 counties/50 years) as shown in the enclosed Table 1. Because population is not a major driver of the increased water demand, it is highly unlikely that water demand will increase over the years. Even if the population projections were accurate, the limited range of alternatives presented in the SEIS does not objectively evaluate potential in-basin alternatives.

Nor did the Bureau evaluate implementing conservation measures to help meet water supply demand. To quantitatively assess the Souris River as a potential supply, a Souris River model should have been developed during the decade in which the Bureau has been working on this project. A Souris River Basin model is indispensable to a credible evaluation of alternatives if the Bureau was to have taken a hard look at all of their options. There are five USGS stream gages on the Souris River, with records dating back to 1937 or earlier, to serve as a foundation for development of such a model. The USGS gage on the Souris River above Minot, North Dakota, has a contributing drainage area of 3,900 square miles with an average annual runoff of 129,249 acre-feet for the time period of 1904-2013. This data suggests there is a substantial source of water that can be developed along with sustainable groundwater withdrawals to supply the projected 2060 demand of 10.40 million gallons per day, or just under 12,000 acre-feet demand per year. Unfortunately, the Bureau did not evaluate alternatives that capture some of the river's high flows to provide a more reliable water supply.

A comprehensive quantification of depletions is necessary to effectively analyze the impacts to users in the Missouri River basin. The Bureau has apparently disregarded our previous comments requesting this analysis, so the current depletion estimates continue to remain insufficient. In 2012, the Bureau developed the Depletions Database, modifying their methodology based on hydrologic unit codes (HUCs), rather than 'node basins' and updating depletions estimates to reflect 2007 irrigated acreage. Development of the Depletions Database is a positive improvement; however, the foundation of the Database still relies on assumptions and adjustments to outdated 1978 data gathered by the Missouri Basin States Association. To develop the database, the Bureau relied on the same methodology described in its 2005 report, *A Study to Determine Historic and Present-Level Streamflow Depletions in the Missouri River basin for the Period 1929 to 2002*. The report acknowledges that there are many limitations in the analysis due primarily to time constraints that could have been resolved in the intervening years. Without a comprehensive study of depletions, the analysis of cumulative impacts is flawed.

The effects of existing depletions already impact Missouri River basin users without the additional withdrawals identified for this project. According to the Depletions Database, the Missouri River has an average of 5.05 million acre-feet (MAF) of existing depletions above Garrison Dam. This amounts to approximately one-third of the average annual volume for the Missouri River at Bismarck, North Dakota (average annual yield 16.2 MAF). It is evident that the Missouri River basin is substantially depleted by consumptive uses today. Therefore, the selection of an inter-basin diversion as the proposed Preferred Alternative for this project is ill-advised and will ultimately be unsustainable as a reliable source of water supply.

The Bureau excluded potential, but non-adjudicated, Tribal water projects in the futures analysis of future water project depletions as stated in Appendix D. It can reasonably be expected that additional tribal water right adjudications will occur by 2060 as demand for water continues to increase. Six tribes have adjudicated water rights with the State of Montana, most in the last ten years. To identify and yet exclude reasonably foreseeable projects disregards the intent of the NEPA and ignores the court's directive that the Bureau take a "hard look" at the cumulative impacts of water withdrawals on the Missouri River. The need to appropriately evaluate potential Tribal water projects is further evidenced by recent requests from multiple tribes in South Dakota to begin Congressional hearings on preserving water rights for the tribes.[1]

With the proposed inter-basin transfer, the Bureau has the responsibility to ensure that the project prevents invasive species transfer. The Preferred Alternative fails to fulfill that obligation. The proposed system to control invasive species transfer is insufficient to support the claims made in the Draft SEIS. This is particularly important in that a single instance of species transfer may prove catastrophic for the receiving watershed. The treatment option identified with the Preferred Alternative lacks the redundant system necessary to prevent transfer of aquatic invasive species between watersheds. Relying on a single system with no redundancies poses an unacceptable risk to the watershed in the event of a system failure. No practicable recovery is available after the water is transferred across the basin divide. It is recommended that a "treat and hold" system be analyzed as this type of approach would allow water to be retained until treatment has been assured through testing. No system for such assurance testing is presently included in the Draft SEIS resulting in an underestimate of the operational costs of the system. Therefore, the analysis of environmental impacts is incomplete and is missing significant costs.

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[1] "Native American group wants hearing on water rights they say are preserved by 1908 doctrine" http://projects.registerguard.com/apf/sci/sd-water-woes/

This inter-basin transfer establishes "de facto" water rights for residents of the Souris River Basin over those in the Missouri River basin. This attempted transfer of benefits is very apparent in this study, where the Preferred Alternative guarantees water supply to the recipient basin because the base of intake is located 5 feet below the top of the Lake Sakakawea's Permanent Pool and is without a shut off mechanism. The residents of the Missouri River basin, however, do not have a similar guarantee of water supply. With droughts in the Upper Missouri and the Souris River basins typically occurring at the same time, these "de facto" senior rights will amplify impacts to the users in the Missouri River basin.

The use of the U.S. Army Corps of Engineers' (Corps) Economic Resource models to determine economic impacts within the Missouri River Basin is inappropriate because the models are outdated. To analyze economic impacts resulting from implementation of the alternatives in the Draft SEIS, current economic impact models should be developed. The Bureau continues to use the Economic Resource models regardless of changes that have occurred in the past 20 years. The Department strongly opposes the use of these outdated models to evaluate cumulative impacts and recommends that the Bureau and the Corps update their models to reflect the contemporary economic conditions.

It is unclear how the Bureau is calculating the net National Economic Development (NED) benefits. Several critical impacts are not evaluated, such as the impact of additional depletions on the Mississippi River. In the Draft SEIS, the benefits are added to report as total benefits and it appears that the benefits are double-counted. The 1983 Principles & Guidelines requires that the net benefits of a project be reported. The Department recommends that the Bureau report the net benefits and identify how the net benefits differ from total benefits. A benefit-cost ratio of the water supply project cannot be calculated based on the data provided. It is recommended that the Bureau complete a comprehensive Regional Economic Development (RED) analysis for the project and provide a detailed estimate of costs and benefits for this water supply project.

The Missouri River Reservoir System does not contain storage dedicated for Municipal and Industrial (M&I) water supply. Despite this, the Corps has granted easements over the years to access reservoir water for M&I use without a contract for use of the water. The Corps has begun processes to establish an M&I water supply allocation that would require contracts for use of reservoir water. The Corps estimates in the Surplus Water reports that just over 727,000 acre-feet of newly dedicated water supply storage would need to be established in the reservoir system. The impact of this newly established water supply allocation has also never been fully assessed in the Surplus Water Environmental Assessments or in the cumulative impacts of the Draft SEIS.

The expense associated with a dedicated M&I water supply allocation in a Corps reservoir is not included in the Draft SEIS. The Preferred Alternative proposes transferring between 13,600 to 29,100 acre-feet per year out of basin for M&I water supply. To provide this yield, the Corps would require approximately 35,000 to 74,800 acre-feet of storage set aside in the reservoir. According to the Surplus Water reports, this storage would cost between $284,550 to $1,648,592 per year depending on the Corps' approach ($8.13 per acre-foot of storage for Lake Sakakawea or $20.04, the average of all Surplus Water storage across Missouri River reservoirs). This expense was not included in the annual cost estimates for the Missouri River out-of-basin transfer alternatives. Therefore, the economic impact of the proposed project is inadequate and misleading.

In summary, after multiple attempts, the Bureau has failed to complete an adequate cumulative impact assessment and failed to comply with NEPA by not evaluating feasible in-basin alternatives. After viewing the Draft SEIS, the Department is driven to the conclusion that the proposed project is not, and cannot be, justified.

The Department appreciates the opportunity to comment. We once again request to be informed of and invited to all meetings between the Bureau and other agencies regarding this project. Please contact Ryan Mueller at (573) 751-2867 or ryan.mueller@dnr.mo.gov with any questions regarding these comments.

Sincerely,

DEPARTMENT OF NATURAL RESOURCES

Sara Parker Pauley
Director

Enclosures

APPENDIX

Table 1. Benefits and Costs of Alternatives in Draft Supplemental Environmental Impact Statement

Alternatives	Annual construction costs	Net benefit to people 2060	Per Capita Construction Costs
Groundwater with recharge	$216,600,000	123,860	$1,748.33
Groundwater with recharge and the Souris river	$217,100,000	123,860	$1,752.36
Missouri river and conjunctive use	$205,800,000 - $276,800,000	123,860	$1,659.54 - $2,234.24
Missouri river and groundwater (preferred alternative)	$205,500,000 - $276,800,000	123,860	$1,659.54 - $2,234.25
Operation and Maintenance Costs per year	**Annual Operation Costs**	**Net benefit to people 2060**	**Annual Per Capita Costs**
Groundwater with recharge	$8,800,000	123,860	$71.03
Groundwater with recharge and the Souris river	$8,800,000	123,860	$71.03
Missouri river and conjunctive use	$9,500,000 - $10,800,000	123,860	$76.68 - $87.17
Missouri river and groundwater (preferred alternative)	$9,500,000 - $10,800,000	123,860	$76.68 - $87.18
Total costs preferred alternative over 50 years	**680,500,000 - 816,800,000**	**123,860**	**$5,492.78 - $6,592.95**
	Net People Benefited	**Number of Counties**	**Per Capita Benefit/county/year**
Net Benefit over 50 years	**492**	**10**	**1**

Data Sources from Draft SEIS:

1. Table 2-29 – Summary of Construction Cost Estimates by Alternative
2. Table 2-30 – Summary of OM&R Cost Estimates by Alternative
3. Table 3-26 – Population Projections

McLean-Sheridan Rural Water District

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May 11, 2018

Ms. Kate Kenninger
Dakotas Area Office – Bureau of Reclamation
PO Box 1017
Bismarck, ND 58502-1017

Ms. Kenninger-

The McLean-Sheridan Rural Water District serves the Cities of Turtle Lake, McClusky, Coleharbor, and Mercer plus about 600 rural users in McLean and Sheridan Counties. Additionally, we receive water from the City of Washburn under a supply agreement and provide water to 150 rural Washburn users.

All of our customers are relying on the Central North Dakota Water Supply Project to provide them with a supplemental water supply. This area needs reliable access to additional water to maintain our current industries and attract more business and industry.

McLean-Sheridan Rural Water District asks the Bureau of Reclamation to please grant Garrison Diversion's request to access 20 cubic feet per second (cfs) of water from the McClusky Canal to meet central North Dakota's water needs. The supplemental source of water is crucial to central North Dakota's ongoing economic viability.

Best wishes,

Ann Oberg

Ann Oberg
Manager
McLean-Sheridan Rural Water District

NORTH DAKOTA
DEPARTMENT of HEALTH

ENVIRONMENTAL HEALTH SECTION
Gold Seal Center, 918 E. Divide Ave.
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May 1, 2018

Ms. Kate Kenninger
Bureau of Reclamation
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

Re: Revised Draft EA for the Issuance of a Water Service Contract to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project
Burleigh County

Dear Ms. Kenninger:

This department has reviewed the information concerning the above-referenced project submitted under date of April 17, 2018, with respect to possible environmental impacts.

This department believes that environmental impacts from the proposed construction will be minor and can be controlled by proper construction methods. With respect to construction, we have the following comments:

1. Care is to be taken during construction activity near any water of the state to minimize adverse effects on a water body. This includes minimal disturbance of stream beds and banks to prevent excess siltation, and the replacement and revegetation of any disturbed area as soon as possible after work has been completed. Caution must also be taken to prevent spills of oil and grease that may reach the receiving water from equipment maintenance, and/or the handling of fuels on the site. Guidelines for minimizing degradation to waterways during construction are attached.

2. Projects disturbing one or more acres are required to have a permit to discharge storm water runoff until the site is stabilized by the reestablishment of vegetation or other permanent cover. Further information on the storm water permit may be obtained from the Department's website or by calling the Division of Water Quality (701-328-5210). Also, cities may impose additional requirements and/or specific best management practices for construction affecting their storm drainage system. Check with the local officials to be sure any local storm water management considerations are addressed.

3. The proposed construction project overlies the Painted Woods Creek glacial drift aquifer, which is a sensitive groundwater area. Care should be taken to avoid spills of any materials that may have an adverse effect on groundwater quality. All spills must be immediately reported to this Department and appropriate remedial actions performed.

The department owns no land in or adjacent to the proposed improvements, nor does it have any projects scheduled in the area. In addition, we believe the proposed activities are consistent with the State Implementation Plan for the Control of Air Pollution for the State of North Dakota.

These comments are based on the information provided about the project in the above-referenced submittal. The U.S. Army Corps of Engineers may require a water quality certification from this department for the project if the project is subject to their Section 404 permitting process. Any additional information which may be required by the U.S. Army Corps of Engineers under the process will be considered by this department in our determination regarding the issuance of such a certification.

If you have any questions regarding our comments, please feel free to contact this office.

Sincerely,

L. David Glatt, P.E., Chief
Environmental Health Section

LDG:cc
Attach.

NORTH DAKOTA
DEPARTMENT of HEALTH

ENVIRONMENTAL HEALTH SECTION
Gold Seal Center, 918 E. Divide Ave.
Bismarck, ND 58501-1947
701.328.5200 (fax)
www.ndhealth.gov

Construction and Environmental Disturbance Requirements

These represent the minimum requirements of the North Dakota Department of Health. They ensure that minimal environmental degradation occurs as a result of construction or related work which has the potential to affect the waters of the State of North Dakota. All projects will be designed and implemented to restrict the losses or disturbances of soil, vegetative cover, and pollutants (chemical or biological) from a site.

Soils

Prevent the erosion of exposed soil surfaces and trapping sediments being transported. Examples include, but are not restricted to, sediment dams or berms, diversion dikes, hay bales as erosion checks, riprap, mesh or burlap blankets to hold soil during construction, and immediately establishing vegetative cover on disturbed areas after construction is completed. Fragile and sensitive areas such as wetlands, riparian zones, delicate flora, or land resources will be protected against compaction, vegetation loss, and unnecessary damage.

Surface Waters

All construction which directly or indirectly impacts aquatic systems will be managed to minimize impacts. All attempts will be made to prevent the contamination of water at construction sites from fuel spillage, lubricants, and chemicals, by following safe storage and handling procedures. Stream bank and stream bed disturbances will be controlled to minimize and/or prevent silt movement, nutrient upsurges, plant dislocation, and any physical, chemical, or biological disruption. The use of pesticides or herbicides in or near these systems is forbidden without approval from this Department.

Fill Material

Any fill material placed below the high water mark must be free of top soils, decomposable materials, and persistent synthetic organic compounds (in toxic concentrations). This includes, but is not limited to, asphalt, tires, treated lumber, and construction debris. The Department may require testing of fill materials. All temporary fills must be removed. Debris and solid wastes will be removed from the site and the impacted areas restored as nearly as possible to the original condition.

Environmental Health Section Chief's Office	Division of Air Quality	Division of Municipal Facilities	Division of Waste Management	Division of Water Quality
701.328.5150	701.328.5188	701.328.5211	701.328.5166	701.328.5210

North Dakota Department of Transportation

Thomas K. Sorel
Director

Doug Burgum
Governor

OFFICIAL FILE COPY
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DATE	INITIAL	TO
		Kate B.
CLASSIFICATION		
PROJECT		
CONTROL NO.		
FOLDER I.D.		

May 14, 2018

Arden Freitag
Area Manager
USDI
P.O. Box 1017
Bismarck, ND 58502-1017

DRAFT EA FOR ISSUANCE OF WATER SERVICE CONTRACT TO GARRISON CONSERVANCY, CENTRAL NORTH DAKOTA

We have reviewed your April 17, 2018, letter.

This project should have no adverse effect on the North Dakota Department of Transportation highways.

However, if because of this project any work needs to be done on highway right of way, appropriate permits and risk management documents will need to be obtained from the Department of Transportation District Engineer, Larry Gangl at 701-328-6955.

Robert Fode

ROBERT A. FODE, P.E., DIRECTOR – OFFICE OF PROJECT DEVELOPMENT

57/raf/js
c: Larry Gangl, Bismarck District Engineer

608 East Boulevard Avenue • Bismarck, North Dakota 58505-0700
Information: 1-855-NDROADS (1-855-637-6237) • FAX: (701) 328-0310 • TTY: 711 • dot.nd.gov

Reclamation's Responses to Comments on Draft Revised Environmental Assessment

City of Carrington

1. "I am writing to let the Bureau of Reclamation know that Carrington strongly supports the Garrison Diversion Conservancy Districts' request to withdraw up to 20 cfs of water from the McClusky Canal."

Response: Comment noted.

2. "Carrington, which is in Foster County, is just one of the many cities and water systems that will benefit from the economic development opportunities afforded by access to a supplemental water supply. In addition to Foster County, areas of Burleigh, Sheridan, Wells, Foster, Kidder, McLean and Stutsman Counties would also benefit."

Response: Comment noted.

3. "In order for our city to continue to grow and prosper over the long term, Carrington needs a reliable source of water to attract new businesses and industry, as well as retain local businesses and industry. Without an adequate water supply, our City business and industrial growth will be restricted."

Response: Comment noted.

4. "Please grant Garrison Diversion's request to withdraw water from the McClusky Canal for the Central North Dakota Water Supply Project. We believe our future success depends on access to water through this much-needed project."

Response: Comment noted.

Coalition to Protect the Missouri River

1. "In our previous comment letter, we requested a revised EA that includes specific information on population growth, as documented the U.S. Census Bureau. The EA does not include any information to fulfill this request. While the Bureau takes a step forward in providing further information in Table 1 of the EA (Central North Dakota Water Supply Nomination Information), the document still misses the mark, as the table only provides a listing of "potential industrial activities." As we have mentioned previously, the Bureau needs to provide a clearer depiction of actual water needs."

Response: U.S. Census Bureau data or population projections were not utilized as the project water would be used for industrial needs not domestic purposes as stated in Chapter 1. Reclamation properly focused the need for the 20 cfs requested by Garrison Diversion on the community requests based on the Central North Dakota User Nomination Process Report[1].

Through the revised draft EA process, the Central North Dakota User Nomination Process Report was completed and summarized in Table 1 "Central North Dakota Water Supply Nomination Information" on page 1-4 of the EA. The communities involved in the project (Stutsman Rural Water District, Jamestown, Carrington, Central Plains Water District, Tuttle and South Central Regional Water District) have determined their projected industrial growth will exceed existing North Dakota State Water Commission groundwater permits. The City

[1] AE2S and Black & Veatch. 2017. Central North Dakota User Nomination Process. B&V Project No. 192840. Prepared for Garrison Diversion Conservancy District.

of Carrington and McLean-Sheridan Rural Water District have reiterated their need for the project through comment letters on the release of the revised draft EA.

2. "The revised EA does nothing to alleviate our concerns about the potential of the Central North Dakota Water Supply Project to contribute to an out-of-basin transfer of Missouri River water to the Hudson Bay Basin. Again, we wish to be on the record with the Bureau that propose diversions such as the CNDWSP do not honor congressional intent of the Missouri River's authorized purposes and can cause harm to our members."

Response: A Water Service Contract, issued for the project by Reclamation, will include conditions to maintain use of the 20 cfs entirely within the Missouri River Basin. As discussed on the section of the revised draft EA titled "Operation", beginning on page 2-6 of the Final EA, the final proposed alternative incorporates infrastructure, including meters and controls, that will be utilized so the project does not withdraw more water from the Canal than will be needed by the CNDWSP users in the Missouri River Basin and will not be used to supplement water supplies for the RRVWSP. North Dakota has non-federal options for a water supply for RRVWSP and Reclamation lacks control over where and how RRVWSP water will be delivered.

Section 9 of the 1944 Flood Control Act authorized the Missouri River System to be operated for the purposes of flood control, navigation, irrigation, power, ***water supply***, water quality control, recreation, fish and wildlife. Reclamation has independent Congressional authority to construct, or direct the construction of, water supply projects and withdraw Reclamation-related project water from the Missouri River provided in the Garrison Diversion Unit Reformulation Act of 1986 and as amended by the Dakota Water Resources Act of 2000. Reclamation's actions to approve, disapprove, or approve with conditions this request for water service is consistent with congressionally authorized water supply purpose.

3. "We stand by our previous request for the Bureau to conduct a new and separate Environmental Impact Statement for this project, in order for a full range of alternatives to be evaluated and for further input from Missouri River basin stakeholders and other interested parties. It is our belief the CNDWSP should not move forward until this critical step is completed."

Response: Reclamation prepared this EA completing the analysis of potential direct, indirect, and cumulative impacts that would result from the implementation of the Proposed Action or alternative to the Proposed Action. This EA ensures Reclamation's compliance with the National Environmental Policy Act (NEPA), and supports making a determination as to whether any "significant" impacts would result from the Proposed Action. Significantly is defined by NEPA in 40 CFR 1508.27. The range of alternatives an agency must discuss is a matter within the agency's discretion. Reclamation analyzed an appropriate range of alternatives in the EA. Where an agency is asked to consider a specific plan, it is appropriate to take into account the needs and goals of the parties involved in the application and to consider the views of Congress. Consideration of the proposed action and the no action alternative satisfies NEPA.

Global Affairs Canada

1. "The revised draft EA makes clear that the CNDWSP would be part of the RRVWSP. How, and at what point, will the Bureau consider the inter-basin impacts of the CNDWSP impacts on Canada?"

Response: The state-sponsored RRVWSP will proceed independent of the CNDWSP and does not need approvals from Reclamation. Garrison Diversion requested 20 cfs to be utilized within the Missouri River Basin; therefore there are no interbasin impacts as a result of the CNDWSP. NEPA does not dictate that agency review of a federal action encompass non-federal, private activity outside the scope of the geographically limited federal action that is not subject to federal control or permitting. Reclamation satisfied NEPA by analyzing the reasonably foreseeable direct, indirect and cumulative effects of its discreet regulatory action.

Reclamation also notes that North Dakota's legislature conditioned the RRVWSP funding on environmental regulation compliance, including compliance with the Boundary Waters Treaty of 1909 (2017 N.D. Sess. Laws Ch. 19, §8).

2. "How will federal and state governments coordinate efforts in order to address transboundary impacts and Boundary Water Treaty implications of these projects in accordance with the 1977 recommendation of the International Joint Commission related to the water diversion projects associated with the Garrison Diversion?"

Response: See Response to question 1.

3. "How will the Bureau closely examine the cumulative effects and broader impacts of the CNDWSP as a components of the larger inter-basin RRVWSP?"

Response: See Response to question 1.

4. "What types of treatment will be put in place for Missouri River basin water before it enters the Hudson Bay basin?"

Response: See Response to question 1.

Province of Manitoba Sustainable Development

1. "It remains our view, based on the revised draft EA, that the CNDWSP cannot be considered separately from the State-sponsored Red River Valley Water Supply Project (RRVWSP) in terms of purpose, infrastructure, or potential environmental impacts."

Response: See response above to question 1 from Global Affairs Canada. The state-sponsored RRVWSP will proceed independent of the CNDWSP and does not need approvals from Reclamation.

2. "Finally, the Bureau's approval of a water service contract for the CNDWSP cannot move forward without a Corps of Engineers permit under section 404 of the Clean Water Act to construct intake facilities along the McClusky Canal, which will require significant dredge and fill operations."

Response: No approval(s) would be needed from the USACE regarding the water intake on the Canal for the CNDWSP. The Canal has an exemption (r) to Section 404 of the Federal

Water Pollution Control Act of 1972 (P.L. 92-2500), as amended by the Clean Water Act of 1977 (P.L. 92-217) under sub-Section 404(r).

3. "We would also note that the revised draft EA still does not assess the existing or planned local water distribution networks that may be connected to the CNDWSP in the proposed service area, or the potential for further distribution of untreated Missouri River water via these local distribution systems through non-pipeline means."

Response: A Water Service Contract, issued for the project by Reclamation, would include conditions to maintain use of the 20 cfs in the Missouri River Basin. Water requested is industrial water, there will be no connection to local distribution systems that cross into the Hudson Bay Drainage Basin.

4. "We would further recommend that the Bureau undertake a full Environmental Impact Statement for this project."

Response: Reclamation prepared this EA completing the analysis of potential direct, indirect, and cumulative impacts that would result from the implementation of the Proposed Action or alternative to the Proposed Action. This EA ensures Reclamation's compliance with the National Environmental Policy Act (NEPA), and supports making a determination as to whether any "significant" impacts would result from the Proposed Action. Significantly is defined by NEPA in 40 CFR 1508.27.

Missouri DNR

1. "The Bureau of Reclamation (Bureau) still has not conducted a sufficient analysis of environmental impacts in the Revised Draft EA. Therefore, the Bureau should complete an Environmental Impact Statement (EIS) to take a "hard look" as required by the National Environmental Policy Act (NEPA)."

Response: Reclamation prepared this EA completing the analysis of potential direct, indirect, and cumulative impacts that would result from the implementation of the Proposed Action or alternative to the Proposed Action. This EA ensures Reclamation's compliance with the National Environmental Policy Act (NEPA), and supports making a determination as to whether any "significant" impacts would result from the Proposed Action. Significantly is defined by NEPA in 40 CFR 1508.27.

2. "The Bureau neglected to address the State of Missouri's opposition to the depletions analysis and the cumulative impacts thereof."

Response: The Missouri River depletion analysis contained in the revised EA is based on the most recent and best available information and data. The *Cumulative Impacts to the Missouri River for the Bureau of Reclamation's Northwest Area Water Supply Project* (U.S. Army Corps of Engineers, 2013 and Reclamation's Missouri River Basin Depletions Database, 2012) was the basis for Reclamation's 2015 Supplemental Environmental Impact Statement for the Northwest Area Water Supply Project. Contrary to statements in this comment, Reclamation is confident this is the most comprehensive analysis available. In response to previous comments from the author on this topic, Reclamation has clearly communicated that Reclamation has modernized this effort since the 2005 study referenced in the comment. Reclamation has substantial expertise in the area of Missouri River depletions and has updated our data and modernized our methods since the original Missouri River Basin Sates Association (MRBSA) Study was completed in 1982 and the Reclamation 2005 study.

Reclamation's Depletion Database is the most recent data available and builds upon both the MRBSA Study and Reclamation's 2005 study. Updated data in the Depletion's Database includes the top two depletion categories for water diversion (irrigated agriculture and public surface water supply systems) which together account for approximately 94% of the total estimated depletions within the basin.

3. "The Bureau has yet to provide adequate rationale for the need for the project."

Response: An agency's obligation to respond to permit applications consistent with its statutory authorities is a purpose that is uniquely governmental, but which also takes into account the private applicant's objectives. Through the revised draft EA process, the Central North Dakota User nomination Process Report was completed and summarized in Table 1 "Central North Dakota Water Supply Nomination Information" on page 1-4 of the EA. The communities involved in the project (Stutsman Rural Water District, Jamestown, Carrington, Central Plains Water District, Tuttle and South Central Regional Water District) have determined their projected industrial growth will exceed existing North Dakota State Water Commission groundwater permits. The City of Carrington and McLean-Sheridan Rural Water District have reiterated their need for the project through comment letters on the release of the revised draft EA. Reclamation independently evaluated this information in considering the purpose and need for the project.

4. "Futhermore, stating the water delivered to the state-funded Red River Valley Water Supply Project (RRVWSP) would remain in the Missouri River basin does not alleviate concerns related to the Boundary Water Treaty."

Response: See response above to question 1 from Global Affairs Canada. The state-sponsored RRVWSP will proceed independent of the CNDWSP and does not need approvals from Reclamation. Garrison Diversion requested 20 cfs to be utilized within the Missouri River Basin. As discussed on the section of the revised draft EA titled "Operation", beginning on page 2-6 of the Final EA, infrastructure including meters and controls will be utilized so the project does not withdraw anymore water from the Canal than will be needed by the CNDWSP users in the Missouri River Basin.

Mclean-Sheridan Rural Water District

1. "All of our customers are relying on the Central North Dakota Water Supply Project to provide them with a supplemental water supply. This area needs reliable access to additional water to maintain our current industries and attract more business and industry."

Response: Comment noted.

2. "McLean-Sheridan Rural water District asks the Bureau of Reclamation to please grant Garrison Diversion's request to access 20 cubic feet per second (cfs) of water from the McClusky Canal to meet central North Dakota's water needs. The supplemental source of water is crucial to central North Dakota's ongoing economic viability."

Response: Comment noted.

North Dakota Department of Health

1. Care is to be taken during construction activity near any water of the state to minimize adverse effects on a water body. This includes minimal disturbance of stream beds and banks to prevent excess siltation, and the replacement and revegetation of any disturbed area as soon as possible after work has been completed. Caution must also be taken to prevent spills of oil and grease that may reach the receiving water from equipment maintenance, and/or the handling of fuels on the site. Guidelines for minimizing degradation to waterways during construction are attached.

Response: Table 2 includes the Best Management Practices and environmental commitments that would be implemented during construction of this project to avoid and/or minimize impacts to wetlands and waterways.

2. Projects disturbing one or more acres are required to have a permit to discharge storm water runoff until the site is stabilized by the reestablishment of vegetation or other permanent cover. Further information on the storm water permit may be obtained from the Department's website or by calling the Division of Water Quality (701-328-5210). Also, cities may impose additional requirements and/or specific best management practices for construction affecting their storm drainage system. Check with the local officials to be sure any local storm water management considerations are addressed.

Response: Table 2 of the final EA has been revised to include a commitment for Garrison Diversion to obtain a 401 Water Quality Certification permit, as necessary.

3. The proposed construction project overlies the Painted Woods Creek glacial drift aquifer, which is a sensitive groundwater area. Care should be taken to avoid spills of any materials that may have an adverse effect on groundwater quality. All spills must be immediately reported to this Department and appropriate remedial actions performed.

Response: Table 2 of the final EA has been revised to include a commitment for Garrison Diversion to report any spill immediately to the North Dakota Department of Health, and to perform remedial actions as directed by the North Dakota Department of Health.

4. The department owns no land in or adjacent to the proposed improvements, nor does it have any projects scheduled in the area. In addition, we believe the proposed activities are consistent with the State Implementation Plan for the Control of Air Pollution for the State of North Dakota.

Response: Comment noted.

North Dakota State Water Commission

1. "However, if surface water or groundwater will be diverted for construction of the project, a water permit will be required per North Dakota Century Code (NDCC) § 61-04-02. Please consult with the Water Appropriations Division of the Office of the State Engineer (OSE) if you have any question regarding this comment at 701-328-2754 or waterpermits@nd.gov."

Response: Comment noted.

2. "A floodplain development permit would not be required to the National Flood Insurance Program."

Response: Comment noted.

3. "The Office of the State Engineer (OSE) Engineering and Permitting Section reviewed the project route and determined that the project traverses over or through surface water resources. The OSE requests to be notified regarding the proposed project's impacts, if any, to water resources such as watercourses (i.e. streams or rivers), agricultural drains, and wetlands (i.e. ponds, sloughs, lakes, or any series thereof) as any alterations, modifications, improvements, or impacts to those water resources may require a drainage permit(s) or a construction permit(s) from the Office of the State Engineer (OSE). Please contact the OSE Engineering and Permitting Section at 701-328-4288 if you have any questions."

Response: Table 2 of the final EA has been revised to include a commitment for Garrison Diversion to apply for permits, as necessary, from the North Dakota State Water Commission. Additionally, this comment is reiterated in Chapter 4, as it was noted during the first draft release of the EA.

North Dakota Department of Transportation

1. "This project should have no adverse effect on the North Dakota Department of Transportation highways. However, if because of this project any work needs to be done on highway right of way, appropriate permits and risk management documents will need to be obtained from the Department of Transportation District Engineer, Larry Gangl at 701-328-6955."

Response: Commented noted.

Appendix C: Scoping Letter and Scoping Letter Responses

United States Department of the Interior

BUREAU OF RECLAMATION
Great Plains Region
Dakotas Area Office
P.O. Box 1017
Bismarck, ND 58502-1017

IN REPLY REFER TO:
DK-5000-16-02
ENV-6.00

NOV 18 2016

Subject: Bureau of Reclamation's Preparation of an Environmental Assessment for Issuance of a Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, Burleigh County, North Dakota

Dear Interested Party:

The Bureau of Reclamation (Reclamation) is preparing an Environmental Assessment (EA) for issuance of a water service contract and power contract to the Garrison Diversion Conservancy District (Garrison Diversion) for the Central North Dakota Water Supply Project. Reclamation is the lead Federal agency responsible for ensuring compliance with the National Environmental Policy Act, National Historic Preservation Act, and related federal environmental and cultural resource legislation.

Garrison Diversion has requested a water service contract and project pumping power to withdraw up to 20 cubic feet per second of water from the McClusky Canal, at Mile Marker 42, to serve areas of Stutsman Rural Water District/Jamestown, Central Plains Water District, Tuttle, and potentially other communities within the Missouri River Basin, North Dakota. Municipal and rural water supply from the McClusky Canal, constructed under the Pick-Sloan Missouri River Basin Program, is authorized under the Dakota Water Resources Act of 2000 (Act of December 21, 2000, PL 106-554, 114 Stat. 2763). Reclamation will use this EA to evaluate the environmental impacts associated with the issuance of a water service contract and power contract; and to allow Garrison Diversion to construct an intake, wet well, pump station, 28-inch pipeline, and electric facilities on the McClusky Canal right-of-way. The intake screen would comply with State/Federal guidelines. Existing canal roads would provide access to the location.

The project would be financed by the local users and the State of North Dakota and would be eligible for Federal Municipal, Rural & Industrial funding.

We are requesting your input about the proposed action and information or concerns you may have regarding potential project effects. If no significant issues are identified during scoping or preparation of the EA, Reclamation would issue a Finding of No Significant Impact. Conversely, if any significant issues are identified, Reclamation would consider whether to proceed with the preparation of an environmental impact statement.

Reclamation defines significance in accordance with 40 CFR 1508.27. To be most helpful to the preparers of the EA please provide any comments, concerns or information regarding this project

by December 23, 2016. Questions or comments regarding the preparation of the EA may be directed to Kate Kenninger at 701-221-1282, kkenninger@usbr.gov, or in writing to: Area Manager, Bureau of Reclamation, P.O. Box 1017, Bismarck, North Dakota 58502.

Sincerely,

ARDEN FREITAG

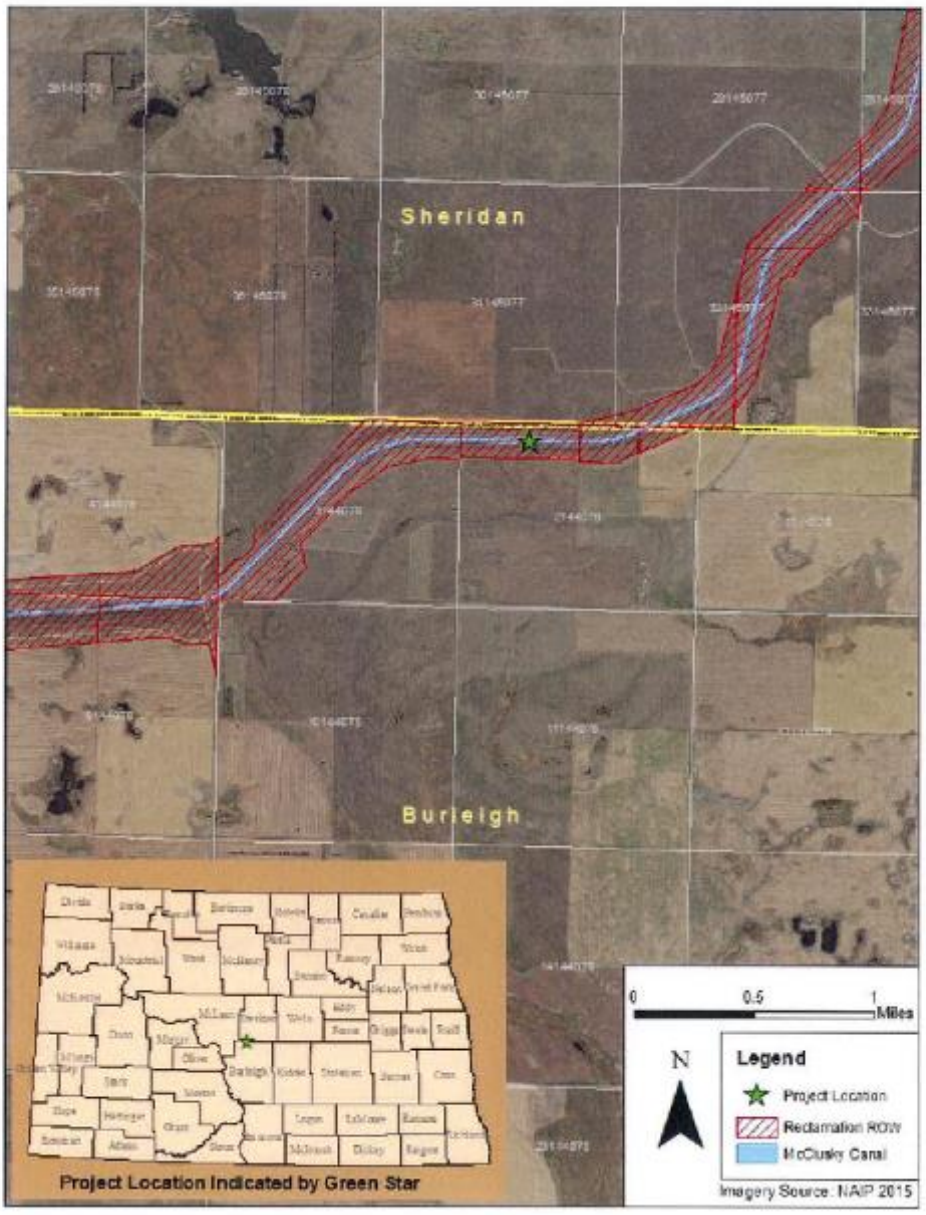
Arden Freitag
Acting Area Manager

Enclosure - Map

cc: Contact List Available From Dakotas Area Office

bc: DK-1000 (Freitag), DK-2000 (Fisher), DK-4100 (Goetzfried, Marohl, Kraft), DK-5000 (Hall, Kenninger, Ehlis), DK-5100 (Boen)
(via electronic copy)

WBR:KKenninger:AVinchattle:11/17/2016:701-221-1282
V:\Public\NEPA\Central ND Water Supply\Scoping Notice\Scoping Letter Final CNDWS 11.17.2016.docx


Sheridan
Burleigh
Project Location Indicated by Green Star
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Miles
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Legend
Project Location
Reclamation ROW
McClusky Canal
Imagery Source: NAIP 2015

Kenninger, Kate <kkenninger@usbr.gov>

EA for the Water Service Project with Central ND Water Supply

1 message

Baer, Kathy <kathy_baer@fws.gov> Mon, Nov 28, 2016 at 10:01 AM
To: Kate Kenninger <kkenninger@usbr.gov>
Cc: Jonathan Beyer <jonathan_beyer@fws.gov>, Todd Frerichs <todd_frerichs@fws.gov>

Kate,

I received your letter regarding the upcoming EA on the Water Supply Project. As I'm sure you are aware, the FWS has numerous wetland and grassland easements throughout ND east of the Missouri River. I'm certain that at some point the waterlines involved in this project will be crossing a wetland or grassland easement. We would like to be included as a cooperating agency in your EA. If you have any questions, please feel free to give Jon Beyer or myself a call.

Thanks,

Kathy Baer
Wetland District Manager
Audubon NWR Complex
3275 11th St NW
Coleharbor, ND 58531
701-442-5474 ext. 114

The Prairie is calling and I must go...

--

NORTH DAKOTA
DEPARTMENT of HEALTH

ENVIRONMENTAL HEALTH SECTION
Gold Seal Center, 918 E. Divide Ave.
Bismarck, ND 58501-1947
701.328.5200 (fax)
www.ndhealth.gov

December 5, 2016

Arden Freitag
Acting Area Manager
Bureau of Reclamation
P.O. Box 1017
Bismarck, ND 58502

Re: Bureau of Reclamation's Preparation of an EA for Issuance of Water Service & Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project, Burleigh County

Dear Mr. Freitag:

This department has reviewed the information concerning the above-referenced project submitted under date of November 18, 2016, with respect to possible environmental impacts.

This department believes that environmental impacts from the proposed construction will be minor and can be controlled by proper construction methods. With respect to construction, we have the following comments:

1. All necessary measures must be taken to minimize fugitive dust emissions created during construction activities. Any complaints that may arise are to be dealt with in an efficient and effective manner.

2. Care is to be taken during construction activity near any water of the state to minimize adverse effects on a water body. This includes minimal disturbance of stream beds and banks to prevent excess siltation, and the replacement and revegetation of any disturbed area as soon as possible after work has been completed. Caution must also be taken to prevent spills of oil and grease that may reach the receiving water from equipment maintenance, and/or the handling of fuels on the site. Guidelines for minimizing degradation to waterways during construction are attached.

3. Projects disturbing one or more acres are required to have a permit to discharge storm water runoff until the site is stabilized by the reestablishment of vegetation or other permanent cover. Further information on the storm water permit may be obtained from the department's website or by calling the Division of Water Quality (701-328-5210). Also, cities may impose additional requirements and/or specific best management practices for construction affecting their storm drainage system. Check with the local officials to be sure any local storm water management considerations are addressed.

4. The proposed construction project location directly overlies the Painted Woods Creek aquifer which has been designated as a sensitive groundwater area by this department. Two private water supply wells (one stock well, one domestic/municipal well) lie approximately one-half mile and one mile southeast of the site, respectively. Care should be taken to avoid spills of any materials that may have an adverse effect on groundwater quality. All spills must be immediately reported to this Department and remedial actions performed.

5. All water taken from the McClusky Canal for use as drinking water must fully meet all surface water treatment requirements under the Safe Drinking Water Act. Such treatment shall be provided prior to the first point(s) of consumption.

6. Plans and specifications for all project features shall be submitted to and approved by this department prior to construction.

The department owns no land in or adjacent to the proposed improvements, nor does it have any projects scheduled in the area. In addition, we believe the proposed activities are consistent with the State Implementation Plan for the Control of Air Pollution for the State of North Dakota.

These comments are based on the information provided about the project in the above-referenced submittal. The U.S. Army Corps of Engineers may require a water quality certification from this department for the project if the project is subject to their Section 404 permitting process. Any additional information which may be required by the U.S. Army Corps of Engineers under the process will be considered by this department in our determination regarding the issuance of such a certification.

If you have any questions regarding our comments, please feel free to contact this office.

Sincerely,

L. David Glatt, P.E., Chief
Environmental Health Section

LDG:cc
Attach.

NORTH DAKOTA
DEPARTMENT of HEALTH

ENVIRONMENTAL HEALTH SECTION
Gold Seal Center, 918 E. Divide Ave.
Bismarck, ND 58501-1947
701.328.5200 (fax)
www.ndhealth.gov

Construction and Environmental Disturbance Requirements

These represent the minimum requirements of the North Dakota Department of Health. They ensure that minimal environmental degradation occurs as a result of construction or related work which has the potential to affect the waters of the State of North Dakota. All projects will be designed and implemented to restrict the losses or disturbances of soil, vegetative cover, and pollutants (chemical or biological) from a site.

Soils

Prevent the erosion of exposed soil surfaces and trapping sediments being transported. Examples include, but are not restricted to, sediment dams or berms, diversion dikes, hay bales as erosion checks, riprap, mesh or burlap blankets to hold soil during construction, and immediately establishing vegetative cover on disturbed areas after construction is completed. Fragile and sensitive areas such as wetlands, riparian zones, delicate flora, or land resources will be protected against compaction, vegetation loss, and unnecessary damage.

Surface Waters

All construction which directly or indirectly impacts aquatic systems will be managed to minimize impacts. All attempts will be made to prevent the contamination of water at construction sites from fuel spillage, lubricants, and chemicals, by following safe storage and handling procedures. Stream bank and stream bed disturbances will be controlled to minimize and/or prevent silt movement, nutrient upsurges, plant dislocation, and any physical, chemical, or biological disruption. The use of pesticides or herbicides in or near these systems is forbidden without approval from this Department.

Fill Material

Any fill material placed below the high water mark must be free of top soils, decomposable materials, and persistent synthetic organic compounds (in toxic concentrations). This includes, but is not limited to, asphalt, tires, treated lumber, and construction debris. The Department may require testing of fill materials. All temporary fills must be removed. Debris and solid wastes will be removed from the site and the impacted areas restored as nearly as possible to the original condition.

North Dakota Geological Survey

Edward C. Murphy - State Geologist

Department of Mineral Resources

Lynn D. Helms - Director

North Dakota Industrial Commission

https://www.dmr.nd.gov/ndgs/

November 29, 2016

Reply to DK-5000-16-02, ENV-6.00

Arden Freitag
Acting Area Manager
Bureau of Reclamation, Great Plains Region

Dear Arden Freitag,

Thank you for requesting our comments. If you have not already, we encourage you to visit the North Dakota Geological Survey (NDGS) website at https://www.dmr.nd.gov/ndgs/ which hosts a surplus of maps and information.

The proposed project location does not present any concerns. However, if the project location were to change please be aware of locations adjacent to the McClusky Canal that are susceptible to slope failure. Currently, the NDGS is mapping the Surface Geology of the 1:24,000 Pickardville Quadrangle to the north of the project location. Areas of slope failure will be mapped on the McClusky Canal. Please be aware for any future projects you may have.

Please contact me if you have any questions.

Best Regards,

Christopher Maike
Geologist
North Dakota Geological Survey

600 E Boulevard Ave - Dept 405, Bismarck, North Dakota 58505-0840 Phone (701)328-8000 Fax (701)328-8010

North Dakota Geological Survey

Edward C. Murphy - State Geologist
Department of Mineral Resources
Lynn D. Helms - Director
North Dakota Industrial Commission
www.state.nd.us/ndgs

November 29, 2016

Area Manager
Bureau of Reclamation
P.O. Box 1017
Bismarck, North Dakota 58502

To Whom it May Concern,

I have reviewed our records to determine if any paleontological sites would be impacted by the following project:

Bureau of Reclamation's preparation of an environmental assessment for issuance of a water service and power contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project
Burleigh County, North Dakota

No paleontological sites have been reported within the designated area of impact. It is unlikely that paleontological resources will be encountered in that area because it is covered by generally unfossiliferous glacial material. However, if fossils are encountered please feel free to contact our office so we can provide guidance for proper mitigation solutions.

Sincerely,

Clint Boyd
Senior Paleontologist
North Dakota Geological Survey

600 E Boulevard Ave - Dept 405, Bismarck, North Dakota 58505-0840 Phone (701)328-8000 Fax (701)328-8010

STATE HISTORICAL SOCIETY OF NORTH DAKOTA

November 22, 2016

Mr. Arden Freitag
Acting Area Manager
U.S. Department of the Interior
Bureau of Reclamation
PO Box 1017
Bismarck ND 58502

ND SHPO REF.: 17-0144 Bureau of Reclamation EA for Issuance of a Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project in portions of [T144N R78W Section 2] Burleigh County, North Dakota

Dear Mr. Freitag,

We received your initial correspondence regarding ND SHPO REF.: 17-0144 Bureau of Reclamation EA for Issuance of a Water Service and Power Contracts to Garrison Diversion Conservancy District for the Central North Dakota Water Supply Project.

We look forward to review by the BOR archaeologist of this project and his recommendations.

Thank you for the opportunity to review to date. Please include the ND SHPO Reference number listed above in any further correspondence for this specific project. If you have any questions please contact Susan Quinnell, Review and Compliance Coordinator at (701) 328-3576 or squinnell@nd.gov

Sincerely,

Claudia J. Berg
State Historic Preservation Officer (North Dakota)

C: Mr. Damien Reinhart, BOR Bismarck

North Dakota Department of Transportation

Grant Levi, P.E.
Director

Doug Burgum
Governor

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CLASSIFICATION
PROJECT
CONTROL NO.
FOLDER I.D.

January 10, 2017

Arden Freitag
Acting Area Manager
US Department of Interior
P.O. Box 1017
Bismarck, ND 58502-1017

EA FOR ISSUANCE OF A WATER SERVICE AND POWER CONTRACT TO GARRISON DIVERSION CONSERVANCY DISTRICT, BURLEIGH COUNTY, NORTH DAKOTA

We have reviewed your November 18, 2016, letter.

This project should have no adverse effect on the North Dakota Department of Transportation highways.

However, if because of this project any work needs to be done on highway right of way, appropriate permits and risk management documents will need to be obtained from the Department of Transportation District Engineers, Kevin Levi at 701-328-6955.

Robert Fode

ROBERT A. FODE, P.E., DIRECTOR – OFFICE OF PROJECT DEVELOPMENT

57/raf/js
c: Kevin Levi, Bismarck District Engineer

608 East Boulevard Avenue • Bismarck, North Dakota 58505-0700
Information: 1-855-NDROADS (1-855-637-6237) • FAX: (701) 328-0310 • TTY: 711 • www.dot.nd.gov

"VARIETY IN HUNTING AND FISHING"

NORTH DAKOTA GAME AND FISH DEPARTMENT

100 NORTH BISMARCK EXPRESSWAY BISMARCK, NORTH DAKOTA 58501-5095 PHONE 701-328-6300 FAX 701-328-6352

December 12, 2016

Arden Freitag
Bureau of Reclamation
Dakotas Area Office
PO Box 1017
Bismarck, North Dakota 58502

Dear Mr. Freitag:

Re: Central North Dakota Water Supply Project Water Service Contract

The North Dakota Game and Fish Department has received notification of the Bureau of Reclamations (Reclamation) intention to prepare an environmental assessment (EA) for issuance of a water service contract and power contract to the Garrison Diversion Conservancy District (Garrison Diversion) for the Central North Dakota Water Supply Project. Garrison Diversion has requested a water service contract and project pumping power to withdraw up to 20 cubic feet per second of water from the McClusky Canal at Mile Marker 42. Reclamation will use the EA to evaluate the environmental impacts associated with the issuance of a water service contract and power contract; and to allow Garrison Diversion to construct an intake, wet well, pump station, 28-inch pipeline, and electric facilities on the McClusky Canal right-of-way. The intake screen would comply with State/Federal guidelines. Existing canal roads would provide access to the location.

A primary concern of the Department's is the water elevation and flow through the McClusky Canal. Will there be a water management plan developed? Will the canal be managed at the same elevation, and if so what impacts will the additional flows have on the freshening of the canal system?

The Department is also concerned the proposed intake could negatively impact fish populations by increasing mortality due to impingement or entrainment if precautions are not incorporated into the design of the project. The following guidelines should be included in the design of the new intake:

1. Intake shall be screened and maintained with ¼" or smaller mesh size openings.
2. Intake velocities shall not exceed ½ foot/second.
3. The intake shall be placed at least 20 vertical feet below the existing water level.
4. The intake shall be elevated 2 to 4 feet off the bottom.

5. If the 20-foot depth is not attainable, then the intake velocity shall be limited to ¼ foot per second, with the intake placed at a maximum practicable attainable depth.

6. Pumping sound levels shall not exceed 75DB at 50 feet.

We request work does not take place within the canal from April 15 to June 1 to protect aquatic resource. Erosion control measures should be implemented to minimize the opportunity for sediments to enter the lake or wetlands and to isolate suspended sediments within the work site (i.e. silt fences, floating turbidity barriers).

Aquatic Nuisance Species (ANS) rules were enacted by the North Dakota Game and Fish Department in 2008. These regulations are to prevent the introduction of undesirable species of plants and animals. Preventive measures are now required to bring equipment into the state. State law allows for fines up to $1,000 and the confiscation of equipment.

Required measures include removing any and all aquatic vegetation from vessels, motors, trailers, or construction equipment; all water shall be drained from bilge(s) or confined spaces on vessels, boat motors or construction equipment; all species of ANS (this list can be found on the North Dakota Game and Fish Department website) must be removed from vessels, motors, trailers or construction equipment; and water must be drained from confined spaces on vessels, boat motors or construction equipment. These ANS preventative measures extend to any and all vehicles, vessels, trailers, pumps and such equipment that will be used in the project or any/all construction efforts connected with this project in or on the waters of the State. This requirement should be included if occurring during the open water season or if the operation proceeds on the ice pack.

The contractor or his agents or subcontractors must provide the Department a reasonable opportunity to inspect any and all vehicles, vessels, pumps and equipment that will be used in the project in or on the waters of the state prior to those items being launched or placed in the waters of the state. A minimum of 72-hour notice must be provided to the Department for scheduling an inspection. The Department's ANS Biologist, Ms. Jessica Howell, is to be contacted at the Jamestown Office (701-368-8368) for equipment inspections or any additional information regarding ANS prevention protocols.

Sincerely,

Greg Link
Chief
Conservation & Communication Division

blk

North Dakota State Water Commission

900 EAST BOULEVARD AVENUE, DEPT 770 • BISMARCK, NORTH DAKOTA 58505-0850
(701) 328-2750 • TTY 1-800-366-6888 or 711 • FAX (701) 328-3696 • http://swc.nd.gov

December 23, 2016

Arden Freitag
Bureau of Reclamation
PO Box 1017
Bismarck, ND 58502

Dear Mr. Freitag:

This is in response to your request for a review of the environmental impacts associated with the Central North Dakota Water Supply Project located in Burleigh County, ND.

The proposed project has been reviewed by State Water Commission staff, and the following comments are provided:

- No permits relative to the National Flood Insurance Program are required based on the current effective FIRM and State minimum standards.

- All waste material associated with the project must be disposed of properly and not placed in identified floodway areas.

Thank you for the opportunity to provide review comments. If you have any questions, please call me at 701-328-4967.

Sincerely,

Jared Huibregtse
Water Resource Planner IV

JH:dm/1570

Appendix D: Scoping Notice Contact List

AUDUBON DAKOTA CHAPTER, EXECUTIVE DIRECTOR

AUDUBON NATIONAL WILDLIFE REFUGE, MR. TODD FRERICHS

BUREAU OF INDIAN AFFAIRS- GREAT PLAINS REGIONAL OFFICE, PROGRAM DIRECTOR

BUREAU OF LAND MANAGEMENT, NORTH DAKOTA FIELD OFFICE

BURLEIGH COUNTY AUDITOR

BURLEIGH COUNTY WATER RESOURCE DISTRICT

COALITION TO PROTECT THE MISSOURI RIVER

DAKOTA RESOURCE COUNCIL

DUCKS UNLIMITED

GARRISON DIVERSION CONSERVANCY DISTRICT, MR. DUANE DEKREY

GLOBAL AFFAIRS CANADA

FEDERAL HIGHWAY ADMINISTRATION, MR. WENDALL MEYER

INDIAN AFFAIRS COMMISSION, MR. SCOTT DAVIS

PROVINCE OF MANITOBA SUSTAINABLE DEVELOPMENT

MHA NATION, HONORABLE MARK FOX, CHAIRMAN

MHA NATION- TRIBAL HISTORIC PRESERVATION OFFICE, ELGIN CROWS BREAST

MISSOURI DEPARTMENT OF NATURAL RESOURCSE

NATURAL RESOURCES CONSERVATION SERVICE, MR. DAVID HENDRICKSON

NATURAL RESOURCE CONSERVATION SERVICE, MS. MARY PODOLL

NORTH DAKOTA CHAPTER OF THE WILDLIFE SOCIETY, PRESIDENT

NORTH DAKOTA DEPARTMENT OF COMMERCE, MR. AL ANDERSON

NORTH DAKOTA DEPARTMENT OF HEALTH, MR. WAYNE KERN

NORTH DAKOTA DEPARTMENT OF HEALTH- ENVIRONMENTAL HEALTH SECTION, MR. DAVID GLATT

NORTH DAKOTA DEPARTMENT OF TRANSPORTATION, MR. GRANT LEVI

NORTH DAKOTA DEPARTMENT OF TRUST LANDS, MR. MIKE HUMANN

NORTH DAKOTA GAME AND FISH DEPARTMENT, NATURAL RESOURCES CHIEF

NORTH DAKOTA GEOLOGICAL SURVEY, STATE GEOLOGIST

NORTH DAKOTA GEOLOGICAL SURVEY, STATE PALONTOLOGIST

NORTH DAKOTA GOVENOR JACK DALRYMPLE

NORTH DAKOTA INDUSTRIAL COMMISSION

NORTH DAKOTA IRRIGATION ASSOCIATION

NORTH DAKOTA PARKS AND RECREATION DEPARTMENT, MR. MARK ZIMMERMAN

NORTH DAKOTA PARKS AND RECREATION DEPARTMENT, MS. KATHY DUTTENHEFNER

NORTH DAKOTA STATE WATER COMMISSION, MR. GARLAND ERBELE

NORTH DAKOTA STATE WATER COMMISSION, MR. JEFFREY MATTERN

NORTH DAKOTA TOURISM DIVISION, MS. SARAH OTTE COLEMAN

NORTH DAKOTA WILDLIFE FEDERATION, MR. MIKE MCENROE

SIERRA CLUB, PRESIDENT DAKOTA CHAPTER

SPIRIT LAKE TRIBE, HONORABLE MYRA PEARSON, CHAIRWOMAN

SPIRIT LAKE TRIBE- TRIBAL HISTORIC PRESERVATION OFFICER, DR. ERICH LONGIE

STANDING ROCK SIOUX TRIBE, HONORABLE DAVE ARCHAMBAULT II, CHAIRMAN

STANDING ROCK SIOUX TRIBE, TRIBAL HISTORIC PRESERVATION OFFICER, JON EAGLE

STATE HISTORICAL SOCIETY OF NORTH DAKOTA, MS. CLAUDIA BERG

TURTLE LAKE IRRIGATION DISTRICT

TURTLE MOUNTAIN BAND OF CHIPPEWA, HONORABLE CHARIMAN RICHARD MCCLOUD

TURTLE MOUNTAIN BAND OF CHIPPEWA, TRIBAL HISTORIC PRESERVATION OFFICER

U.S. ARMY CORPS OF ENGINEERS, MS. PATRICIA MCQUEARY

U.S. ARMY CORPS OF ENGINEERS, MR. TODD LINDQUIST

USDA RURAL UTILITIES SERVICE

U.S. FISH AND WILDLIFE SERVICE, MR. KEVIN SHELLEY

U.S. FISH AND WILDLIFE SERVICE, ZONE ARCHAEOLOGIST

U.S. GEOLOGICAL SURVEY

UNITED STATES HOUSE OF REPRESENTATIVES, HONORABLE KEVIN KRAMER

UNITED STATES SENATOR, HONORABLE HEIDI HIETKAMP

UNITED STATES SENATOR, HONORABLE JOHN HOVEN