Testimony
House Bill 1020 – State Water Commission Budget
House Appropriations Education and Environment Committee
Northwest Area Water Supply Project Update
January 11, 2021

Good morning Chairman Monson and members of the House Appropriations Education and Environment Committee. I am Tim Freije, Northwest Area Water Supply (NAWS)/Southwest Pipeline Project (SWPP) Section Head for the State Water Commission. I am appearing before you today to provide on update on the NAWS project.

After a prolonged legal battle and federal injunction, progress on the NAWS project resumed in August of 2017 and the progress has gained momentum through the current biennium. I will attempt to summarize the project status and progress into current biennium activities and the plan for next biennium.
There has been tremendous progress this biennium despite numerous hurdles and I will summarize the progress by project component.

Components worked on this biennium include improvements to the Minot Water Treatment Plant, four pipeline contracts, the Lansford Reservoir and Pump Station, the Biota Water Treatment Plant, Snake Creek Pumping Plant Intake Modifications, South Prairie Reservoir and Hydraulic Control Structure, Souris and Bottineau Reservoirs and Pumps Stations, and Raw Water Line Condition Assessment. All told, we have roughly $180 million worth of infrastructure in various stages of planning, design, and construction.

The Phase II Improvements to the Minot Water Treatment Plant are nearing completion and will replace the existing softening basins, chemical storage and feed facilities, laboratory, operations room, and influent flow piping amongst other improvements. These improvements will increase treatment capacity from 13 to 14 million gallons per day to 18 million gallons per day.

The four pipeline contracts are on the distribution system and total 70 miles of pipeline. 40 of the miles of pipeline are complete and 30 miles are to be completed by late 2021. Upon completion, the project will be able to deliver 300,000 to 350,000 gallons per day of water to Bottineau.

The Lansford Reservoir and Pump Station has been designed, bid, and is under contract with a completion date of June 2022. This facility will include a 4.3-million-gallon reservoir and a 2500 gallon per minute pump station. This will increase hydraulic capacity on the distribution system and will allow delivery of 400,000 gallons per day to Bottineau and allow utilization of numerous service connections to serve Upper Souris Water District, All Seasons Water Users District, and the City of Westhope.

Phase I of the Biota Water Treatment plant has been designed and bid and will be on the February 11, 2021 State Water Commission meeting agenda for award. The construction and operations and maintenance of this facility is purely for Boundary Waters Treaty Compliance and therefore a federal responsibility. The design so far has been funded with MR&I funds. Two equipment procurement contracts for the

facility are already in place which are also funded with MR&I funds. There should be sufficient remaining MR&I funds appropriated to the Biota WTP to cover anticipated expenditures through the end of the current biennium. We would not have been able to award this contract without the line of credit included in Senate Bill 2020 last session. A similar line of credit in House Bill 1020 this session will likely be necessary to allow the construction of this critical project component given the unknown nature of federal appropriations.

The design of the Intake Modifications to the Snake Creek Pumping Plant are ninety percent complete. The bidding timeframe will be primarily determined by receipt of permits from the U.S. Army Corps of Engineers. We anticipate bidding the project late summer 2021.

Design of the South Prairie Reservoir and Hydraulic Control Structure is roughly 70 percent complete and will include a ten-million-gallon reservoir on the raw water line north of the highway 83/23 intersection and a hydraulic control structure on the high point of the raw water line five miles south of the reservoir. The reservoir will provide an average day's use of storage on the raw water line making the supply system more robust and greatly simplifying operations. The hydraulic control structure provides a hydraulic break to control pressures to protect the integrity of the pipeline. The intake, Biota water treatment plant, and reservoir and hydraulic control structure will be necessary to deliver lake water to Minot.

Project components currently under contract total $70 million, with $18 million of those expenses remain to incurred. $63.2 million in contracts have been bid since September. Expenditures this biennium through November total $32.3 million, including $15.9 million in federal MR&I funding, $10.2 million reimbursed by the City of Minot, and $6.2 million from 2017-2019 carryover from the resource trust fund. Planned project components for the 2021-2023 biennium include construction of the Snake Creek Pumping Plant Intake Modifications, South Prairie Reservoir and Hydraulic Control Structure, Souris and Bottineau Reservoirs and Pump Stations, and design of the Phase III improvements at the Minot Water Treatment Plant. The objective of the work next biennium is to deliver Lake Sakakawea water to Minot for treatment and distribution. The project is currently treating and distributing water from the aquifers in the Minot area, which is a finite supply and temporary solution. Aquifer levels in the area had been decreasing for years and rebounded greatly following the flood of 2011. The aquifer levels were fairly stable from 2011 through 2014 due to lower-than-average water use, wet weather, large tracts of uncropped farmland, and record rainfalls in 2014. The aquifer levels have been rapidly declining since then. Current dry conditions may accelerate that decrease which could negatively affect water availability.

Water availability for the project is currently thirteen to fourteen million gallons per day. Completion of the Phase II improvements to the Minot Water Treatment Plant will increase treatment capacity to eighteen million gallons per day but the aquifers are only expected to produce fifteen to sixteen million gallons per day. Eighteen

million gallons per day, if not more, will be available upon delivery of Lake Sakakawea water to Minot, anticipated in early 2024.

Proposed NAWS funding for the 2021-2023 biennium includes $100 million in authority and $41.5 million in resource trust funding from the 2021-2023 biennium appropriation. No funding from the 2019-2021 biennium resource trust funding was available for the NAWS project. A line of credit for the Biota Water Treatment Plant will likely be needed to continue progress on the project to serve water to our citizens that desperately need it. Phase I of the Biota plant is the second largest project in agency history behind the east Devils Lake outlet and it is a critical component for delivery of water to avert an incipient water supply crisis and is a $64 million federal responsibility with $15.9 million in federal funding available.

Mr. Chairman, this concludes my update on the NAWS project. I will stand for any questions you or the committee have.

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NAWS

House Bill 1020 Appropriations Committee Update

January 11, 2021

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

Minot Water Treatment Plant Phase II Improvements

4 Pipeline Contracts

Lansford Reservoir & Pump Station

Biota Water Treatment Plant

Snake Creek Pumping Plant Intake Modifications Design

South Prairie Reservoir & Hydraulic Control Structure Design

Souris & Bottineau Reservoirs & Pump Stations Design

Raw Water Line Condition Assessment

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

Minot Water Treatment Plant Phase II Improvements

- Nearing Completion, Should Be Treating Water By Peak Water Use Season
- Increases Treatment Capacity To 18 Million Gallons Per Day

4 Pipeline Contracts

- 70 Miles Total, 40 Miles Complete, 30 Miles To Be Completed By Late Fall 2021
- Will Allow System To Deliver Water To Bottineau

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

Lansford Reservoir & Pump Station

- Designed, Bid, & Under Contract
- 4.3 Million Gallon Reservoir – 2500 GPM Pump Station
- Will Increase Hydraulic Capacity Of Distribution System
- April 2022 Substantial Completion Date

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

Biota Water Treatment Plant Phase I

- Designed & Bid, Will Be On 2-11-21 SWC Meeting Agenda For Award
- For Boundary Waters Treaty Act Compliance, Ergo Funding Is A Federal Responsibility
- Design Has Been Funded With MR&I Funding
- Could Not Award Without Line Of Credit In SB2020
- Remaining MR&I Appropriation Should Be Able To Cover Expenditures This Biennium
- Another Line Of Credit In HB1020 Would Allow Ability To Progress Without Dependence On Federal Appropriations

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

Snake Creek Pumping Plant Intake Modifications Design

- Design Is 90% Complete
- Bid Date Dependent On Federal Permits-Likely August
- No Funding This Biennium

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

South Prairie Reservoir & Hydraulic Control Structure

- Design Should Be Complete By The End Of The Biennium
- Includes A 10 Million Gallon Reservoir & A Hydraulic Control Structure On The High Point Of The Raw Water Line

Souris & Bottineau Reservoirs & Pump Stations

- The Last 15 Miles Of Pipeline Going To Bottineau Increase 300 Feet In Elevation
- These Two Reservoir & Pump Stations Will Be Necessary To Deliver Final Design Flows To Bottineau & ASWUD Near Bottineau
- Design Kickoff Meeting Is Later This Week

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

Raw Water Line Condition Assessment

- Broken Down Into 4 Segments, 3 Of Which Have Passed Pressure Testing
- 3 Leaks Repaired, One Remains To Be Repaired

2019-2021 BIENNIUM PROGRESS

PROJECT FUNDING

Project Components Currently Under Contract - Total $70 Million

- ~$18 Million Remaining To Be Expended

$63.2 Million In Contracts Have Been Bid Since September

$180 Million In Infrastructure In Various Stages Of Design Or Construction

2019-2021 BIENNIUM PROGRESS

PROJECT FUNDING

Expenditures This Biennium Through November – Total $32.3 Million

- $15.9 Million In MR&I
- $10.2 Million Reimbursed From Minot
- $6.2 Million From 2017-2019 Carryover RTF

2019-2021 BIENNIUM PROGRESS

PROJECT COMPONENTS

Snake Creek Pumping Plant Intake Modifications

South Prairie Reservoir & Hydraulic Control Structure

Souris/Bottineau Reservoirs & Pump Stations

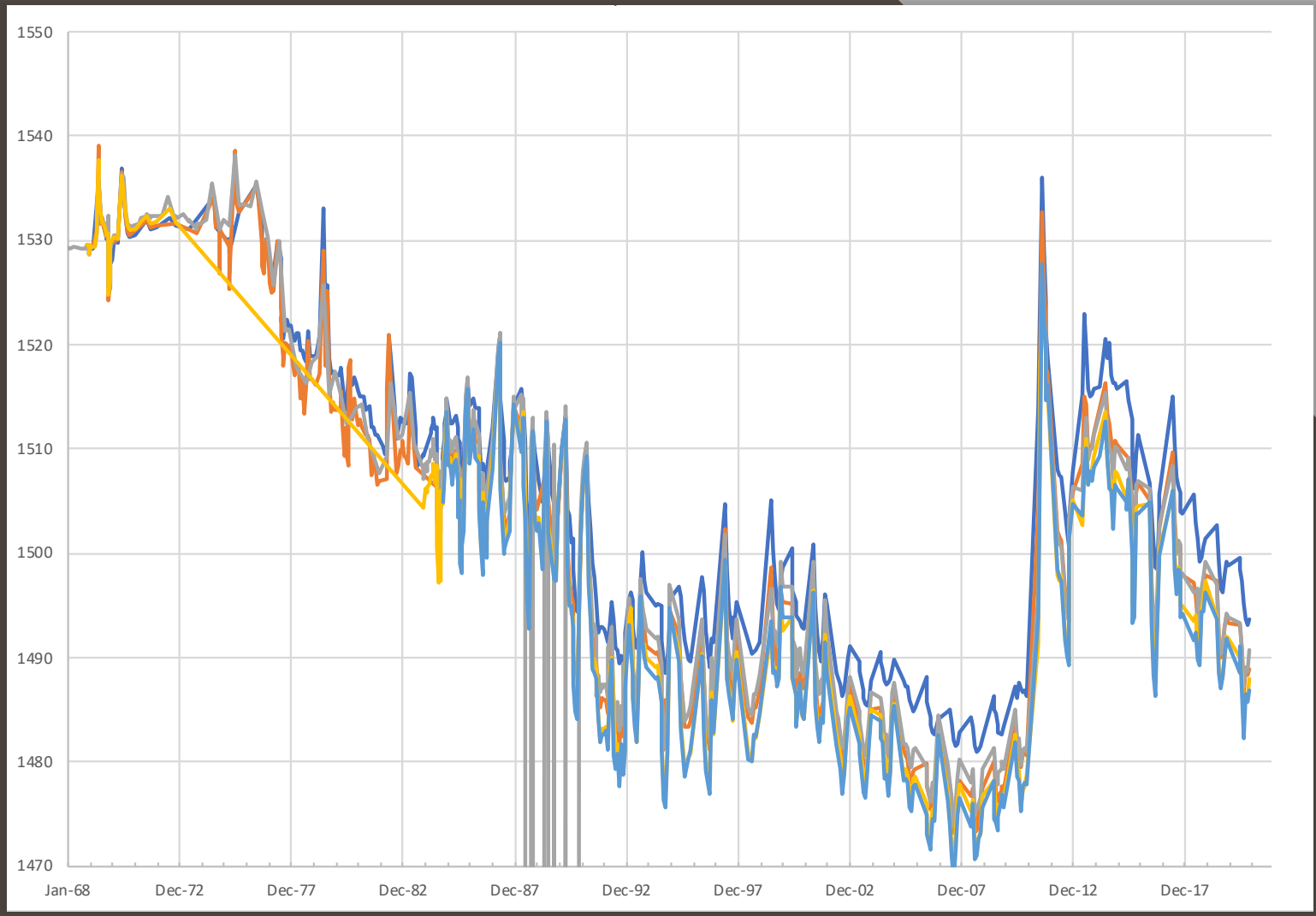
Design Of Minot WTP Improvements Phase III

2019-2021 BIENNIUM PROGRESS

OBJECTIVES

All Components Necessary To Deliver Lake Sakakawea Water To Minot For Final Treatment And Distribution

SUNDRE AQUIFER WATER LEVELS



2019-2021 BIENNIUM PROGRESS

WATER SUPPLY AVAILABILITY

Currently: 13-14 Million Gallons Per Day

Upon Completion Of Minot WTF Phase II Improvements: 15-16 Million Gallons Per Day, Later This Year

Upon Deliver Of Lake Sakakawea Water To Minot: 18 Million Gallons Per Day, Early 2024

2019-2021 BIENNIUM PROGRESS

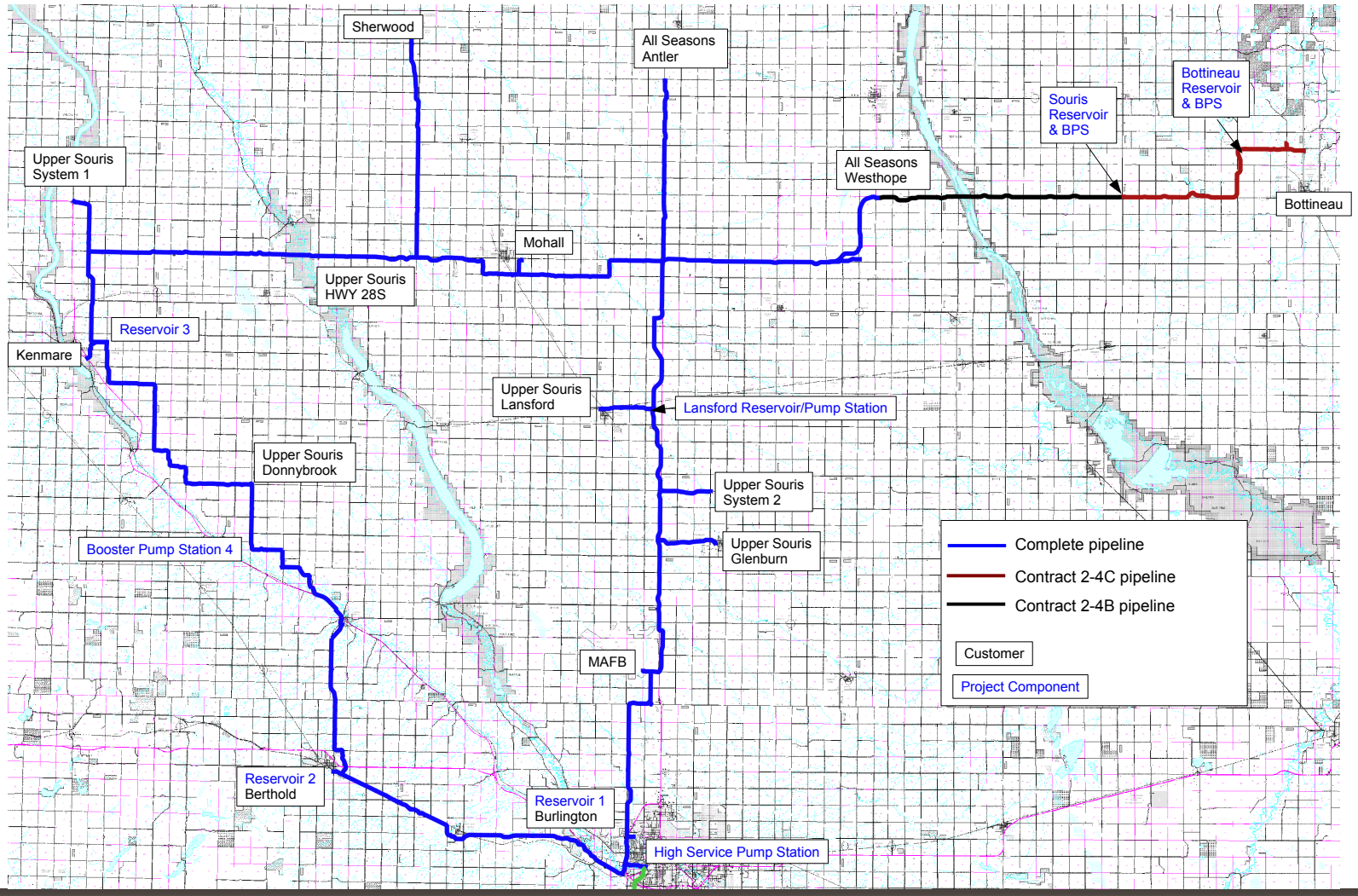
PROJECT FUNDING

$100M Authority

$41.5M RTF Funding

Line Of Credit Would Be Beneficial

MAP


Sherwood
All Seasons Antler
Bottineau Reservoir & BPS
Souris Reservoir & BPS
Upper Souris System 1
All Seasons Westhope
Bottineau
Mohall
Upper Souris HWY 28S
Reservoir 3
Kenmare
Upper Souris Lansford
Lansford Reservoir/Pump Station
Upper Souris Donnybrook
Upper Souris System 2
Upper Souris Glenburn
Booster Pump Station 4
MAFB
Reservoir 2 Berthold
Reservoir 1 Burlington
High Service Pump Station
Complete pipeline
Contract 2-4C pipeline
Contract 2-4B pipeline
Customer
Project Component