Meeting Summary Lower Platte River Consortium Meeting Tuesday, August 22, 2017 at 2:00 pm Lower Platte South NRD 3125 Portia Street, Lincoln Nebraska

Consortium members present included the following: LPSNRD – Paul Zillig & David Potter

P-MRNRD – Paul Zillig & David Potter
P-MRNRD – Marlin Petermann & Paul Woodward
LPNNRD – Eric Gottschalk & Daryl Andersen
NeDNR – Amy Zoller
City of Lincoln – Steve Huggenberger
MUD – Rick Kubat

Other attendees included John Engel (HDR), Simone Rock (HDR), David Kracman (TFG), Chance Thayer (TFG), Jeremy Gehle (NeDNR), Mary Baker (NEMA), Larry Ruth (LPSNRD), Gary Hellerich (LPSNRD), Vern Barrett (LPSNRD), Gary Aldridge (LPSNRD), Jim Shields (MUD)

Paul Zillig providing an update to the group on the budget to date. The next Bureau of Reclamation reporting period ends September 30. HDR will send a draft to NeDNR for review and subsequently to all Consortium members.

The HDR Team updated the group on the progress on equipment installation. TFG has purchased and received the pressure transducers and is working with respective NRDs to instrument existing wells. TFG has received two bids for installation of new groundwater transducers with plans of selecting a company and moving forward in the next few weeks.

Site 1A is an existing ENWRAA continuous recorder (every 8 hours). The Consortium agreed to move 1A to the existing P-MRNRD well nest to the south.

TFG has been working with NeDNR on the surface water gaging locations. NeDNR has visited all seven locations identified. NeDNR measured Sites 12 and 13. Sites 4 and 2B were being used by USGS for "seep-runs" so the NeDNR will measure these locations in the future. NeDNR was unable to access sites 9a and 2b due to high flows and expressed concern about the ability to access these locations in the future.

HDR updated the Consortium on the progress to date on the drought-forecasting tool. HDR's hydrometeorology group in Denver is taking lead on development of the forecasting tool in conjunction with the Project Team. The tool under development considers various hydro climatic indices from various data sources (USGS, SNOTEL, CNPPID, etc.) to predict both a long-range (beginning mid-November to forecast April conditions) and short-range drought forecast (beginning April 15 to predict July/August conditions). The various datasets have been

compiled and drought indices calculated. The tool is currently being calibrated to understand which indices are the best predictors of historic droughts.

HDR led the Consortium through the list of mitigation/response actions (project) identified in the May 16 Workshop. At the May 16 meeting, the conveyance tool was in spreadsheet format. Since that time, the conveyance tool has been converted to a STELLA model to make the conveyance tool more user friends once it is turned over to the Consortium members at the conclusion of the project. TFG walked the Consortium through the user interface and the tool was used to share the results of the preliminary investigation of the benefits of each of the mitigation/response actions identified. Comments on the mitigation/response actions (projects) were:

- 1. Skull Creek Site 31 did not provide much benefit as a drought response action. The Consortium requested the Skull Creek location be moved downstream.
- 2. The Mead alternative would require a storage facility of 2,000 AF. The HDR Team will investigate feasible storage locations for this alternative.
- 3. Paul Woodward wanted the HDR Team to consider pumps in Todd Valley that could be operated for short periods. He also asked the HDR Team to consider siphoning Looking Glass Creek under the Power Canal or using Fremont Lakes similar to Lake Clagus. He thinks multiple lakes with smaller pumps would be more feasible.
- 4. Marlin questioned whether the group should consider any alternative that only benefits LWS. All the Elkhorn alternatives would discharge below MUD Platte West.

HDR/TFG will continue to work on the response/mitigation alternatives identified to date, making refinements where necessary. All options will be evaluated in the conveyance tool and combinations of alternatives will be investigated, as will conceptual level cost estimates and potential permitting requirements. Once all these factors are better understood, a matrix of options will be developed ranking the options from a feasibility perspective.

Next Steps:

- HDR to send out a Doodle Poll for the next Consortium meeting to take place October/November timeframe.
- The next Consortium Workshop #2 will be pushed to late winter/early spring to allow for completion of the forecasting tool and refinement of the mitigation/response actions. The Consortium members requested that upstream NRDs be invited to the next Workshop.

The meeting adjourned at 3:35 p.m.

LOWER PLATTE RIVER CONSORTIUM

PURPOSE: To study long-term water supplies available to the lower subbasin for enhancing streamflows or aquifer storage to support sustainable public water systems.

PARTIES TO THE CONSORTIUM AGREEMENT:

- Nebraska Department of Natural Resources
- Lower Platte North NRD

- Metropolitan Utilities District
 Papio-Missouri River NRD
 City of Lincoln-Lincoln Water System
- Lower Platte South NRD