

## DATA QUALITY REVIEW SHEET

ECMC Facility ID: 753874  
 Station Name: North Star Well  
 Sample Date: 8/16/2023  
 Field Sample ID: North Star Well

Operator: TEP Rocky Mountain LLC  
 Drill Pad: Tompkins Pad  
 Purpose: 2nd Subsequent Rule 615  
 Lab Sample ID: 2308302-01

Field Sampling Data Review	Yes	No	N/A
1. Well properly purged?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Flow rate reduced prior to sampling?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Water quality parameters stable prior to sampling?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. Field instruments calibrated properly?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Sampling methods performed according to SAP procedures?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Procedures consistent with obtaining a representative sample?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lab Data Report Review			
7. Proper sample custody maintained until laboratory receipt?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8. Receipt form is without discrepancies?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9. Samples received at the recommended water temperature of $\leq 6^{\circ}\text{C}$ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10. All samples analyzed for the requested analyses?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
11. Proper laboratory methods used?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
12. All sample holding times met besides pH?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
13. Lab QC samples (LCS, LCSD, MB, MS, and MSD) collected and analyzed according to lab method and results within method acceptance limits?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
14. Was the field investigation sample matrix used by the lab for matrix QC for all analyses?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
15. Laboratory qualifiers for sample results (other than non-detect)?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
16. Additional qualifiers assigned by WWL to the sample results?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
17. Were submitted trip blanks acceptable?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
18. Are corrective actions required? <i>If yes, list actions and dates to be completed by:</i>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
<i>Corrective Action</i>	<i>Date to be completed</i>		
None	N/A		

Calculated Parameters	Calculated Value	Measured Lab Value	Ratio/Percent Difference	Acceptable Limit	Meets QC Criteria?
Cation/Anion Balance, % (CAB)	5.84%	3.98%	N/A	2%	<input type="checkbox"/>
Total Dissolved Solids, mg/L (TDS)	273	470	1.72	1.0 – 1.2	<input type="checkbox"/>
Specific Conductance, $\mu\text{S}/\text{cm}$ (SpC)	701	528	1.33	0.9 – 1.1	<input type="checkbox"/>
TDS/SpC, calculated	N/A	N/A	0.39	0.55-0.7	<input type="checkbox"/>
TDS/SpC, lab measured	N/A	N/A	0.89	0.55-0.7	<input type="checkbox"/>
Anion (meq/L):SpC	N/A	N/A	1.13	0.9 – 1.1	<input type="checkbox"/>
Cation (meq/L):SpC	N/A	N/A	1.01	0.9 – 1.1	<input checked="" type="checkbox"/>

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**Comments:**

- The CAB was not within the acceptable limit. WWL assigned an “O” qualifier to the CAB parameter.
- Laboratory pH analysis was analyzed two days outside of hold time, WWL qualified the result with an “H” qualifier.
- The TDS was not within the acceptable limit.
- A “J” qualifier was assigned to total phosphorus, manganese, total xylenes, and total BTEX.
- There were method blank detections for sulfate, total xylenes, and total BTEX.
- Bromide and calcium were not within method control limits.
- North Star Well was selected for lab duplicate RPD testing of methane, ethane, and propane.

**Data Suitability Statement**

Based upon this data quality review and your professional judgement, have the data been collected and analyzed in general accordance with the ECMC Model Sampling and Analysis Plan?		<input checked="" type="checkbox"/>
Are the data suitable for release for incorporation into the ECMC Environmental Database?		<input checked="" type="checkbox"/>
The inorganic data are qualified due to QC criteria not being met; data are considered estimated and released for incorporation into the ECMC Environmental Database.		<input checked="" type="checkbox"/>
<b>Data Reviewer's Name:</b>	Taralee Mautz	<b>Company:</b> Western Water & Land, Inc.
<b>Reviewer's Signature:</b>	<i>Taralee Mautz</i>	<b>Date:</b> 9/1/2023