

REVISED UTILITY COMMITTEE MEETING AGENDA

August 01, 2023 at 5:45 PM

Kronenwetter Municipal Center - 1582 Kronenwetter Drive Board Room (Lower Level)

1. CALL MEETING TO ORDER

- A. Pledge of Allegiance
- B. Roll Call

2. PUBLIC COMMENT

Please be advised per State Statute Section 19.84(2), information will be received from the public. It is the policy of this Village that Public Comment will take no longer than 15 minutes with a three-minute time period, per person, with time extension per the Chief Presiding Officer's discretion. Be further advised that there may be limited discussion on the information received, however, no action will be taken under public comments.

3. OLD BUSINESS

- <u>C.</u> Discussion/Possible Action: Water/Sewer Rate Study Phase 1 presented by Ehlers
- D. Discussion/Possible Action: Lift Station and Sewer Capacity Study Project presented by RPS
- E. Discussion: Update on the Water Filtration Project presented by Becher Hoppe

4. REPORTS AND DISCUSSIONS

- F. Update of SCADA System Replacement
- 5. APPROVAL OF MINUTES
 - G. Approval of July 6, 2023 Minutes
- 6. CONSIDERATION OF ITEMS FOR FUTURE AGENDA
- 7. NEXT MEETING: September 5, 2023
- 8. ADJOURNMENT

WRITTEN COMMENTS: You can send comments on agenda items to <u>kcoyle@kronenwetter.org</u> NOTE: Requests from persons with disabilities who need assistance to participate in this meeting or hearing should be made at least 24 hours in advance to the Village Clerk's office at (715) 693-4200 during business hours.

Posted: 07/28/2023 Kronenwetter Municipal Center and <u>www.kronenwetter.org</u>

Faxed: WAOW, WSAW, WSAU, and Mosinee Times | Emailed: Wausau Daily Herald

REPORT TO UC



ITEM NAME:	Ehlers – Water/Sewer Rate Study
MEETING DATE:	8/1/2023
PRESENTING COMMITTEE:	UC
COMMITTEE CONTACT:	
STAFF CONTACT:	Lisa Kerstner
PREPARED BY:	Lisa Kerstner

ISSUE:

OBJECTIVES: Present Phase 1 of Water/Sewer Rate Study.

ISSUE BACKGROUND/PREVIOUS ACTIONS:

PROPOSAL:

ADVANTAGES:

DISADVANTAGES:

ITEMIZE ALL ANTICIPATED COSTS (Direct or Indirect, Start-Up/One-Time, Capital, Ongoing & Annual, Debt Service, etc.)

RECOMMENDED ACTION: Proceed with Phase 2

OTHER OPTIONS CONSIDERED:

TIMING REQUIREMENTS/CONSTRAINTS:

FUNDING SOURCE(s) – Must include Account Number/Description/Budgeted Amt CFY/% Used CFY/\$

Remaining CFY Account Number: Description: Budgeted Amount: Spent to Date: Percentage Used: Remaining:

ATTACHMENTS (describe briefly): Ehlers Documents and presentation

August 1, 2023

2023 WATER RATE STUDY:

Village of Kronenwetter, WI

Phase I: Long-Range Cash Flow Analysis



Prepared by:

Ehlers N19W24400 Riverwood Drive, Suite 100 Waukesha, WI 53188 Advisors:

Brian Roemer *Municipal Advisor* Greg Johnson *Senior Municipal Advisor*

BUILDING COMMUNITIES. IT'S WHAT WE DO.

2023 Water Rate Study

Section 1 — Historical Analysis



Table 1Water Rate Performance

Village of Kronenwetter, WI

		Shown w	ith no incre	ase			
Rev	venue Requirement					Est	Budget
Component	Description	2018	2019	2020	2021	2022	2023
Cash Basis							
1	O&M and PILOT	\$483,487	\$497,410	\$505,191	\$420,465	\$341,802	\$510,342
2	Debt	\$113,015	\$0	\$0	\$0	\$0	\$0
3	Cash Funded Capital [^]	\$121,568	\$108,975	\$31,300	\$46,378	\$54,744	\$40,000
	Less:						
	Other Revenue	\$39,810	\$42,021	\$45,198	\$45,699	\$45,737	\$31,360
	Interest Income	\$6,201	\$8,568	\$6,395	\$4,363	\$3,942	\$15,000
	Revenue Requirement	\$672,059	\$555,796	\$484,898	\$416,781	\$346,867	\$503,982
	(Costs less Other Income)						
	User Rates Revenue	\$702,723	\$688,576	\$752,008	\$780,577	\$793,875	\$752,500
	Rate Adequacy	\$30,665	\$132,780	\$267,110	\$363,796	\$447,008	\$248,518
	Rate Adjustment Needed	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
Utility Basis (F	PSC)						
1	O&M and PILOT	\$483,487	\$497,410	\$505,191	\$420,465	\$341,802	\$510,342
2	Depreciation	\$85,155	\$88,205	\$90,070	\$91,305	\$93,223	\$106,483
	NIRB	\$2,862,116	\$2,885,208	\$2,867,720	\$2,810,223	\$2,645,311	\$3,130,171
	PSC Benchmark ROR (%)	4.90%	5.70%	4.90%	4.90%	4.90%	6.50%
3	PSC Benchmark ROR (\$)	\$140,244	\$164,457	\$140,518	\$137,701	\$129,620	\$203,461
	Less:						
	Other Revenue	\$39,810	\$42,021	\$45,198	\$45,699	\$45,737	\$31,360
	Interest Income	\$6,201	\$8,568	\$6,395	\$4,363	\$3,942	\$15,000
	Revenue Requirement (Costs less Other Income)	\$662,875	\$699,483	\$684,186	\$599,409	\$514,966	\$773,926
	User Rates Revenue	\$702,723	\$688,576	\$752,008	\$780,577	\$793,875	\$752,500
	Rate Adequacy	\$39,848	(\$10,907)	\$67,822	\$181,168	\$278,909	(\$21,426)
	Rate Adjustment Needed	0.00%	1.58%	0.00%	0.00%	0.00%	2.85%

Notes:

Ancludes annual capital not funded with debt and recommended debt coverage at 1.1x annual debt payment



Table 2Water Utility Rate Performance Charts







Table 3Water Utility Cash Flow Analysis - Historical 2018-2022

Village of Kronenwetter, WI

		Act	ual		Estimated
	2018	2019	2020	2021	2022
Revenues					
Total Revenues from User Rates	\$702,723	\$688,576	\$752,008	\$780,577	\$793,875
Percent Increase to User Rates	0.00%	0.00%	0.00%	0.00%	0.00%
Other Revenues					
Interest Income	\$6,201	\$8,568	\$6,395	\$4,363	\$3,942
Other Income	\$61,564	\$56,710	\$56,296	\$57,697	\$49,341
Total Other Revenues	\$67,765	\$65,278	\$62,691	\$62,060	\$53,283
Total Revenues	\$770,488	\$753,854	\$814,699	\$842,637	\$847,158
Less: Expenses					
Operating and Maintenance	\$316,271	\$337,528	\$341,409	\$263,423	\$341,802
PILOT Payment	\$167,216	\$159,882	\$163,782	\$157,042	\$0
Net Before Debt Service and Capital Expenditures	\$287,001	\$256,444	\$309,508	\$422,172	\$505,356
Existing Debt P&I	\$113,015	\$0	\$0	\$0	\$0
Transfer In (Out)/Cap. Contrib.	\$0	\$0	\$0	\$0	\$0
Less: Capital Improvements	\$110,266	\$108,975	\$31,300	\$46,378	\$54,744
Debt Proceeds/Grants	\$0	\$0	\$0	\$0	\$0
Reconcile to Audit	\$1,990	\$9,775	\$23,930	-\$12,613	
Net Annual Cash Flow	\$65,710	\$157,244	\$302,138	\$363,181	\$450,612
Restricted and Unrestricted Cash Balance:					
Balance at first of year	\$396,766	\$462,476	\$619,720	\$921,858	\$1,285,039
Net Annual Cash Flow Addition/(subtraction)	\$65,710	\$157,244	\$302,138	\$363,181	\$450,612
Balance at end of year	\$462,476	\$619,720	\$921,858	\$1,285,039	\$1,735,651

Notes:

Table 4Water Utility Financial Benchmarking Analysis

Village of Kronenwetter, WI

		Actu	al		Estimated	Budget
	2018	2019	2020	2021	2022	2023
Target minimum cash balance						
Target minimum working capital - Ehlers ¹	293,991	297,428	262,770	233,506	309,256	418,576
Actual Days Cash Available - PSC ²	533	670	986	1,781	1,853	1,421
Actual Days Cash Available - Moody's ³	534	670	986	1,781	1,853	1,421
Actual Days Cash Available - S&P ⁴	534	670	986	1,781	1,853	1,421
Actual working capital-cash balance	462,476	619,720	921,858	1,285,039	1,735,651	1,987,169
Over (Under) Ehlers target	168,485	322,293	659,088	1,051,533	1,426,394	1,568,593
Over (Under) PSC target (90 days)	443	580	896	1,691	1,763	1,331
Over (Under) Moody's target (150 days)	384	520	836	1,631	1,703	1,271
Over (Under) S&P target (150 days)	384	520	836	1,631	1,703	1,271

Notes:

1) Target capital equals 5 mos of next year's operating expenses, including depreciation, plus 100% of following year's debt.

- 2) PSC formula = O&M expense + taxes + interest on long term debt ÷ 365 to get expense per day. Then Unrestricted Cash ÷ expense per day
- 3) Moody's Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] ÷ Total O&M Expenses less Depreciation
 4) S&P Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] ÷ Total O&M Expenses less Depreciation; include designated reserve funds: ERFs, RSFs, etc

Rate of Return						
Average Utility Plant in Service	3,926,193	4,014,720	4,071,684	4,093,363	4,134,260	4,709,569
Plus: Materials and Supplies	7,477	7,804	8,070	12,089	15,859	15,859
Less: Utility Plant Accumulated Depreciation	967,213	1,051,946	1,145,635	1,247,801	1,358,795	1,465,278
Less: Regulatory Liability	104,341	85,370	66,399	47,428	28,457	9,486
Average Net Investment Rate Base (NIRB)	2,862,116	2,885,208	2,867,720	2,810,223	2,762,867	3,250,664
Net Operating Income	173,758	148,848	202,096	303,591	404,587	167,035
ROR	6.07%	5.16%	7.05%	10.80%	14.64%	5.14%
Benchmark	4.90%	5.70%	4.90%	4.90%	4.90%	6.50%

Cost Recovery						
Operating Revenues	742,533	730,597	797,206	826,276	839,612	783,860
Operating Expenses incl. Depr & Amortization	689,472	705,579	713,826	630,647	560,415	742,215
Operating Expenses w/o Depr & Amortization	483,487	497,410	505,191	420,465	341,802	510,342
Cost Recovery incl. Depr	1.08	1.04	1.12	1.31	1.50	1.06
Cost Recovery w/o Depr	1.43	1.42	1.41	1.50	1.64	1.45
Target	1.00	1.00	1.00	1.00	1.00	1.00

Notes:

This operating ratio indicates whether operating revenues (mostly charges to customers) were sufficient to cover operations and capital (in the form of depreciation) for the water and/or wastewater utility in the fiscal year. A ratio of less than 1 could be a sign of financial concern. In general, this ratio should be higher than 1 to accommodate

A ratio of less than 1 could be a sign of financial concern. In general, this ratio should be higher than 1 to accommodate future capital investments.

Leverage



Total Long-Term Debt	0	0	0	0	0	0
Total Net Assets	12,485,513	12,569,723	12,605,261	12,770,814	13,175,374	14,265,374
Debt-to Equity Ratio	0.00	0.00	0.00	0.00	0.00	0.00

Notes:

This indicator measures the existing level of leveraging of assets, and is used by funders and bond rating agencies to evaluate the risk of providing additional loans to the utility. The ratio indicates the amount of long-term debt that exists for every \$1 of assets (fund equity). A utility with a ratio greater than 1.0 has more long-term debt than equity in the system's assets. There are no natural benchmarks for this indicator, and funders and bond rating agencies will assess this ratio in various ways. In general, the higher this ratio, the more likely the utility will be considered to be over-leveraged and the more difficult it will be for the utility to obtain additional loans. For this ratio, Net Assets are equal to the Net Investment Rate Base of the utility.

Condition of Assets:						
Accumulated Depreciation Expense	2,960,026	3,154,256	3,359,320	3,578,730	3,817,905	4,049,778
Total Net Assets	12,485,513	12,569,723	12,605,261	12,770,814	13,175,374	14,265,374
Asset Depreciation	23.71%	25.09%	26.65%	28.02%	28.98%	28.39%

Notes:

This indicator of infrastructure condition estimates the portion of the average expected life of the utility's physical assets that has already passed. As this ratio approaches 100%, the capital assets become fully depreciated, and infrastructure needs replacement or rehabilitation. The accuracy of this indicator relies heavily on the accuracy of the depreciation schedule, and historic pricing likely distorts this indicator (newer utilities may be slightly disadvantaged as a result).



Section 3, ItemC.

Table 5Water Utility Financial Health Charts





2023 Water Rate Study

Section 2 — Long-Range Cash Flow Analysis



Table 6Water Utility Capital Improvement Plan

Projects	Funding	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	Totals
Water Meter Change Out	Cash	40,000	40,000	40,000								120,000
Water Filtration Project	Revenue Debt	1,050,000	2,525,000									3,575,000
Water & Sewer GIS System	Cash		50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	450,000
10 Year Well Inspection	Cash			50,000				50,000				100,000
Well 3	Revenue Debt										4,000,000	4,000,000
Actual CIP Costs		1,090,000	2,615,000	140,000	50,000	50,000	50,000	100,000	50,000	50,000	4,050,000	8,245,000
Sources of Funding		2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	
G.O. Debt		0	0	0	0	0	0	0	0	0	0	0
Revenue Debt		1,050,000	2,525,000	0	0	0	0	0	0	0	4,000,000	7,575,000
Grants/Aids		0	0	0	0	0	0	0	0	0	0	0
Special Assessment		0	0	0	0	0	0	0	0	0	0	0
User Fees		0	0	0	0	0	0	0	0	0	0	0
Cash		40,000	90,000	140,000	50,000	50,000	50,000	100,000	50,000	50,000	50,000	670,000
Total		1,090,000	2,615,000	140,000	50,000	50,000	50,000	100,000	50,000	50,000	4,050,000	8,245,000
Notes:												

Table 7Capital Improvements Financing Plan

	2032	
	Revenue	Water
	Bonds	Portion
	2032 Water	
	Projects	
CIP Projects ¹	4,000,000	4,000,000
Less Other Available Revenues		
Cash Available	(2,200,000)	(2,200,000)
Net Borrowing Requirement	1,800,000	1,800,000
Debt Service Reserve Debt Service Reserve Funds On Hand New Debt Service Reserve Requirement Subtotal Reserve Fund Requirement	- 190,000 190,000	0 <u>190,000</u> 190,000
Estimated Issuance Expenses	84,600	84,600
TOTAL TO BE FINANCED	2,074,600	2,074,600
Estimated Interest Earnings4.00%Assumed spend down (months)3.00	(18,000)	(18,000)
Rounding	3,400	3,400
NET BOND SIZE	2,060,000	2,060,000
Notes: 1) Source of Project Totals		



Table 8 Water Utility Projected Debt Service Payments (PROPOSED)

Village of Kronenwetter, WI

NAME	SD	WFL (Wate Proj. No.	er Filtrati 5533-04	on)	V	Vater Reve Series	enue Bond 2031	s		PROP	OSED Wat	er Utility De	ebt Service Sumi	mary
AMT		\$3,575	5,000			\$2,060	0,000							
DATED		6/26/	2024			6/1/	2032							
MATURE		5/	1			5/	/1							
		-,			J, -									
Year	Principal	Est. Rate ²	Interest	Total	Principal	Est. Rate ⁴	Interest	Total		Total Prin	Total Int	Total P&I	Prin Outstanding	Year
2023										0	0	0	0	2023
2024	0	2.695%	85,106	85,106						0	85,106	85,106	3,575,000	2024
2025	137,225	2.695%	94,497	231,722						137,225	94,497	231,722	3,437,775	2025
2026	140,923	2.695%	90,749	231,672						140,923	90,749	231,672	3,296,852	2026
2027	144,721	2.695%	86,900	231,621						144,721	86,900	231,621	3,152,130	2027
2028	148,621	2.695%	82,947	231,569						148,621	82,947	231,569	3,003,509	2028
2029	152,627	2.695%	78,888	231,515						152,627	78,888	231,515	2,850,882	2029
2030	156,740	2.695%	74,719	231,459						156,740	74,719	231,459	2,694,142	2030
2031	160,964	2.695%	70,438	231,402						160,964	70,438	231,402	2,533,178	2031
2032	165,302	2.695%	66,042	231,344		7.000%	60,083	60,083		165,302	126,125	291,427	4,427,875	2032
2033	169,757	2.695%	61,527	231,284	100,000	7.000%	140,700	240,700		269,757	202,227	471,984	4,158,118	2033
2034	174,332	2.695%	56,890	231,222	100,000	7.000%	133,700	233,700		274,332	190,590	464,922	3,883,786	2034
2035	179,030	2.695%	52,129	231,159	100,000	7.000%	126,700	226,700		279,030	178,829	457,859	3,604,756	2035
2036	183,855	2.695%	47,239	231,094	100,000	7.000%	119,700	219,700		283,855	166,939	450,794	3,320,901	2036
2037	188,810	2.695%	42,217	231,027	100,000	7.000%	112,700	212,700		288,810	154,917	443,727	3,032,091	2037
2038	193,899	2.695%	37,060	230,959	100,000	7.000%	105,700	205,700		293,899	142,760	436,659	2,738,192	2038
2039	199,124	2.695%	31,764	230,888	100,000	7.000%	98,700	198,700		299,124	130,464	429,588	2,439,068	2039
2040	204,490	2.695%	26,325	230,816	100,000	7.000%	91,700	191,700		304,490	118,025	422,516	2,134,578	2040
2041	210,002	2.695%	20,740	230,742	100,000	7.000%	84,700	184,700		310,002	105,440	415,442	1,824,576	2041
2042	215,661	2.695%	15,004	230,665	100,000	7.000%	77,700	177,700		315,661	92,704	408,365	1,508,915	2042
2043	221,473	2.695%	9,114	230,587	100,000	7.000%	70,700	170,700		321,473	79,814	401,287	1,187,442	2043
2044	227,442	2.695%	3,065	230,507	100,000	7.000%	63,700	163,700		327,442	66,765	394,207	860,000	2044
2045					125,000	7.000%	55,825	180,825		125,000	55,825	180,825	735,000	2045
2046					125,000	7.000%	47,075	172,075		125,000	47,075	172,075	610,000	2046
2047					125,000	7.000%	38,325	163,325		125,000	38,325	163,325	485,000	2047
2048					125,000	7.000%	29,575	154,575		125,000	29,575	154,575	360,000	2048
2049					125,000	7.000%	20,825	145,825		125,000	20,825	145,825	235,000	2049
2050					125,000	7.000%	12,075	137,075		125,000	12,075	137,075	110,000	2050
2051					110,000	7.000%	3,850	113,850		110,000	3,850	113,850	(0)	2051
TOTALS	3 575 000		1 133 360	4 708 360	2 060 000		1 494 033	3 554 033		5 635 000	2 627 394	8 262 394		τοταις

Notes:

1) Rate assumes rate of recent sale of similar transaction

2) Rate assumes 55% of current program market rate plus 100 bps (or 1.00%). 3) Rate assumes recent WI/TE/Rev/BQ sale plus 50 bps (or 0.50%).

4) Rate assumes previous proposed issuance in plan plus 50 bps (or 0.50%).



Legend:

Maturities subject to optional redemption (callable)

Table 9 Water Utility Cash Flow Analysis - Projected 2023-2032

Village of Kronenwetter, WI

	Budget					Projected				
	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032
Revenues										
Total Revenues from User Rates ¹	\$752,500	\$752,500	\$775,075	\$798,327	\$822,277	\$846,945	\$872,354	\$898,524	\$925,480	\$1,136,705
Percent Increase to User Rates	0.00%	0.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	22.82%
Cumulative Percent Rate Increase	0.00%	0.00%	3.00%	6.09%	9.27%	12.55%	15.93%	19.41%	22.99%	51.06%
Dollar Amount Increase to Revenues		\$0	\$22,575	\$23,252	\$23,950	\$24,668	\$25,408	\$26,171	\$26,956	\$211,225
Total Other Revenues	\$49,360	\$46,824	\$47,292	\$47,765	\$48,242	\$48,725	\$49,212	\$49,704	\$50,537	\$51,386
Total Davanuas	P001 000	¢700.004	¢000.067	£946.000	\$070 F10	\$905 670	¢004 566	£0.49.000	£076 019	¢1 100 001
Total Revenues	φου1,000	\$799,324	φ022,307	φ040,092	\$670,519	\$695,670	\$921,500	φ940,ZZ9	\$970,018	φ1,100,091
Less: Expenses										
Operating and Maintenance ²	\$510 342	\$515 445	\$520,600	\$525 806	\$531.064	\$536,375	\$541 738	\$547,156	\$552 627	\$558 154
PILOT Payment	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Net Before Debt Service and Capital Expenditures	\$291,518	\$283,878	\$301,767	\$320,286	\$339,455	\$359,296	\$379,827	\$401,073	\$423,390	\$629,937
Delta Oracita										
Debt Service	0.2	0.9	¢0,	ድር	ድር	¢۵	\$ 0	* 0	0 2	¢0.
New (2023-2032) Debt Service P&I	ው ቆር	۵0 \$85 106	∌∪ \$231 722	ֆ∪ \$231 672	ֆ∪ \$231 621	⊕0 \$231 569	⊅∪ \$231 515	⊕0 \$231 459	\$0 \$231 402	ېں \$291 427
Total Debt Service	\$0	\$85,106	\$231,722	\$231,672	\$231,621	\$231,569	\$231,515	\$231,459	\$231,402	\$291,427
	**	<i></i> ,	+ _ - ,,	+ , - .		+	+,	+,	•	+ - • · , ·=·
Transfer In (Out)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
		• • • • • • • • •	.							
Less: Capital Improvements	\$1,090,000	\$2,615,000	\$140,000	\$50,000	\$50,000	\$50,000	\$100,000	\$50,000	\$50,000	\$4,134,600
Debt Proceeds	\$1,050,000	\$2,525,000	20	20	20	20	\$0	\$ 0	\$0	\$2,060,000
Net Annual Cash Flow	\$251.518	\$108.772	(\$69.955)	\$38.614	\$57.834	\$77.727	\$48.313	\$119.613	\$141.988	(\$1.736.090)
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Restricted and Unrestricted Cash Balance:										
Balance at first of year	\$1,735,651	\$1,987,169	\$2,095,941	\$2,025,986	\$2,064,599	\$2,122,434	\$2,200,161	\$2,248,473	\$2,368,087	\$2,510,075
Net Annual Cash Flow Addition/(subtraction)	\$251,518	\$108,772	-\$69,955	\$38,614	\$57,834	\$77,727	\$48,313	\$119,613	\$141,988	-\$1,736,090
Balance at end of year	\$1,987,169	\$2,095,941	\$2,025,986	\$2,064,599	\$2,122,434	\$2,200,161	\$2,248,473	\$2,368,087	\$2,510,075	\$773,985
"All-in" Debt Coverage	N/A	3 34	1 30	1 38	1 47	1 55	1.64	1 73	1.83	2.16
PSC Days Cash on Hand	1 331	1 184	1 112	1.30	1.47	1.00	1 232	1.73	1 380	2.10
r oo bays dash on nanu	1,001	1,104	1,112	1,102	1,104	1,207	1,202	1,500	1,000	222
Notes:			L	egend:						

1) Assumes no changes in customer count or usage beyond Test Year. 2) Assumes 1.00% annual inflation beyond budget year.

Legend:

Simplified Rate Case (projected eligibility) Conventional (Full) Rate Case



Table 10Water Utility Financial Benchmarking Analysis Projected 2023 - 2032

Village of Kronenwetter, WI

	Budget			Projected												
	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032						
Target minimum cash balance																
Target minimum working capital - Ehlers ¹	418,576	592,075	595,715	598,545	601,396	604,499	607,852	610,766	692,209	912,402						
Actual Days Cash Available - PSC ²	1,421	1,274	1,202	1,222	1,254	1,297	1,322	1,390	1,470	312						
Actual Days Cash Available - Moody's ³	1,421	1,484	1,420	1,433	1,459	1,497	1,515	1,580	1,658	382						
Actual Days Cash Available - S&P ⁴	1,421	1,484	1,420	1,433	1,459	1,497	1,515	1,580	1,658	382						
Actual working capital-cash balance	1,987,169	2,095,941	2,025,986	2,064,599	2,122,434	2,200,161	2,248,473	2,368,087	2,510,075	773,985						
Over (Under) Ehlers target	1,568,593	1,503,866	1,430,271	1,466,054	1,521,037	1,595,662	1,640,621	1,757,321	1,817,865	(138,417)						
Over (Under) PSC target (90 days)	1,331	1,184	1,112	1,132	1,164	1,207	1,232	1,300	1,380	222						
Over (Under) Moody's target (150 days)	1,271	1,334	1,270	1,283	1,309	1,347	1,365	1,430	1,508	232						
Over (Under) S&P target (150 days)	1,271	1,334	1,270	1,283	1,309	1,347	1,365	1,430	1,508	232						

Notes:

1) Target capital equals 5 mos of next year's operating expenses, including depreciation, plus 100% of following year's debt.

2) PSC formula = O&M expense + taxes + interest on long term debt ÷ 365 to get expense per day. Then Unrestricted Cash ÷ expense per day

3) Moody's Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] ÷ Total O&M Expenses less Depreciation

4) S&P Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] ÷ Total O&M Expenses less Depreciation; include designated reserve funds: ERFs, RSFs, etc

Rate of Return										
Average Utility Plant in Service	4,703,694	6.556.194	7.933.694	8.028.694	8.078.694	8,128,694	8.203.694	8.278.694	8.328.694	10.378.694
Plus: Materials and Supplies	8,860	8,860	8.860	8.860	8.860	8.860	8,860	8.860	8,860	8,860
Less: Utility Plant Accumulated Depreciation	1.572.897	1,732,389	1.951.247	2.173.752	2.397.916	2.623.738	2.851.771	3.082.568	3.315.023	3.593.357
Less: Regulatory Liability	9,486	0	0	_,0,0	_,,0	_,,0	0	0	0	0
Average Net Investment Rate Base (NIRB)	3,130,171	4,832,665	5,991,307	5,863,802	5,689,638	5,513,816	5,360,783	5,204,986	5,022,531	6,794,197
Net Operating Income	167,035	109,236	67,608	82,326	99,683	117,708	135,872	154,194	174,692	335,199
ROR	5.34%	2.26%	1.13%	1.40%	1.75%	2.13%	2.53%	2.96%	3.48%	4.93%
Projected PSC Benchmark	6.50%	6.50%	6.50%	6.50%	6.50%	6.50%	6.50%	6.50%	6.50%	6.50%
Cost Recovery										
Operating Revenues	783,860	784,174	807,065	830,637	854,910	879,905	905,643	932,147	959,775	1,171,686
Operating Expenses incl. Depr & Amortization	742,215	800,328	864,847	873,701	880,618	887,587	895,161	903,343	910,472	961,877
Operating Expenses w/o Depr & Amortization	510,342	515,445	520,600	525,806	531,064	536,375	541,738	547,156	552,627	558,154
Cost Recovery incl. Depr	1.06	0.98	0.93	0.95	0.97	0.99	1.01	1.03	1.05	1.22
Cost Recovery w/o Depr	1.45	1.55	1.66	1.66	1.66	1.65	1.65	1.65	1.65	1.72
Target	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00

Notes:

This operating ratio indicates whether operating revenues (mostly charges to customers) were sufficient to cover operations and capital (in the form of depreciation) for the water and/or wastewater utility in the fiscal year. A ratio of < 1 could be a sign of financial concern. In general, this ratio should be > 1 to accommodate future capital investments.

Leverage										
Total Long-Term Debt	0	3,575,000	3,437,775	3,296,852	3,152,130	3,003,509	2,850,882	2,694,142	2,533,178	4,427,875
Total Net Assets	13,915,558	16,530,558	16,670,558	16,720,558	16,770,558	16,820,558	16,920,558	16,970,558	17,020,558	21,070,558
Debt-to Equity Ratio	0.00	0.22	0.21	0.20	0.19	0.18	0.17	0.16	0.15	0.21

Notes:

This indicator measures the existing level of leveraging of assets, and is used by funders and rating agencies to evaluate the risk of providing additional loans to the utility. The ratio indicates the amount of long-term debt that exists for every \$1 of assets (fund equity). A utility with a ratio > 1 has more long-term debt than equity in the system's assets. There are no natural benchmarks for this indicator, and funders and rating agencies will assess this ratio in various ways. In general, the higher this ratio, the more likely the utility will be considered to be over-leveraged and the more difficult it will be for the utility to obtain additional loans. Net Assets are equal to the Net Investment Rate Base of the utility.

Condition of Assets:

Condition of Assets.										
Accumulated Depreciation Expense	4,049,778	4,334,660	4,678,908	5,026,803	5,376,357	5,727,569	6,080,992	6,437,179	6,795,024	7,198,748
Total Net Assets	13,915,558	16,530,558	16,670,558	16,720,558	16,770,558	16,820,558	16,920,558	16,970,558	17,020,558	21,070,558
Asset Depreciation	29.10%	26.22%	28.07%	30.06%	32.06%	34.05%	35.94%	37.93%	39.92%	34.16%

Notes:

This indicator of infrastructure condition estimates the portion of the average expected life of the utility's physical assets that has already passed. As this ratio approaches 100%, the capital assets become fully depreciated, and infrastructure needs replacement or rehabilitation. The accuracy of this indicator

relies heavily on the accuracy of the depreciation schedule, and historic pricing likely distorts this indicator (newer utilities may be slightly disadvantaged as a result).



Table 11Water Utility Statement of Projected Revenue Bond Coverage

Village of Kronenwetter, WI

			Less:		Existing Rev Debt	Future Rev Debt (2023-2032)			
Year	Total Operating Revenues	Transfers In (Out)	Total O&M Expense	Amount Available for Debt Service	Total	Total	Total Water Debt Service	Coverage	Debt Service Capacity @ 1.25x
2023	801,860	0	(510,342)	291,518	-	-	-	N/A	233,214
2024	799,324	0	(515,445)	283,878	-	85,106	85,106	3.34	141,997
2025	822,367	0	(520,600)	301,767	-	231,722	231,722	1.30	9,691
2026	846,092	0	(525,806)	320,286	-	231,672	231,672	1.38	24,556
2027	870,519	0	(531,064)	339,455	-	231,621	231,621	1.47	39,943
2028	895,670	0	(536,375)	359,296	-	231,569	231,569	1.55	55,868
2029	921,566	0	(541,738)	379,827	-	231,515	231,515	1.64	72,347
2030	948,229	0	(547,156)	401,073	-	231,459	231,459	1.73	89,399
2031	976,018	0	(552,627)	423,390	-	231,402	231,402	1.83	107,310
2032	1,188,091	0	(558,154)	629,937	-	291,427	291,427	2.16	212,523
Notes:									

1) Revenue Coverage determined from PROPOSED 2024 SDWF Loan.



Table 12Water Utility Long-Range Planning Analysis



2023 Water Rate Study

Section 3 — Rate Impact Analysis



Table 13Projected Impact of CIP on Typical Residential Utility Bill

Village of Kronenwetter, WI

Water						_				Sewe	er		-		_			_			
Year	Increase	Water Vol.	Water User Charge ²	Uti (Qu	lity Bill arterly)	Change Over Prior Year		Increase	Sewer Vol. Charge ³	Sewer User Charge ³	(Utility Bill (Quarterly)	Cł Ove	hange er Prior Year		Utility (Annu	Bill II)	Cha Over Ye	nge Prior ar	% of MHI (84,435)	Year
		Tiered	Serv. + PFP				-		1,000 Gal	Gen Service											
2022		3.59	29.40	\$	72.48				3.39	21.85	\$	62.53				\$ 540	.04			0.64%	2022
2023	0.00%	3.59	29.40	\$	72.48	\$ -		0.00%	3.39	21.85	\$	62.53	\$	-		\$ 540	.04	\$	-	0.64%	2023
2024	0.00%	3.59	29.40	\$	72.48	\$ -		8.00%	3.66	23.60	\$	67.53	\$	5.00		\$ 560	.05	\$	20.01	0.66%	2024
2025	3.00%	3.70	30.28	\$	74.65	\$ 2.17		8.00%	3.95	25.49	\$	72.93	\$	5.40		\$ 590	.36	\$	30.31	0.70%	2025
2026	3.00%	3.81	31.19	\$	76.89	\$ 2.24		8.00%	4.27	27.52	\$	78.77	\$	5.83		\$ 622	.66	\$	32.30	0.74%	2026
2027	3.00%	3.92	32.13	\$	79.20	\$ 2.31		5.00%	4.48	28.90	\$	82.71	\$	3.94		\$ 647	.64	\$	24.98	0.77%	2027
2028	3.00%	4.04	33.09	\$	81.58	\$ 2.38		5.00%	4.71	30.35	\$	86.84	\$	4.14		\$ 673	.68	\$	26.05	0.80%	2028
2029	3.00%	4.16	34.08	\$	84.02	\$ 2.45		5.00%	4.94	31.86	\$	91.19	\$	4.34		\$ 700	.84	\$	27.16	0.83%	2029
2030	3.00%	4.29	35.11	\$	86.54	\$ 2.52		5.00%	5.19	33.46	\$	95.75	\$	4.56		\$ 729	.16	\$	28.32	0.86%	2030
2031	3.00%	4.42	36.16	\$	89.14	\$ 2.60		3.00%	5.35	34.46	\$	98.62	\$	2.87		\$ 752	.04	\$	21.87	0.89%	2031
2032	22.82%	5.42	44.41	\$	109.49	\$ 20.34		3.00%	5.51	35.49	\$	101.58	\$	2.96		\$ 844	.25	\$	93.21	1.00%	2032
Total Chang	e over plann	ning period				\$ 37.01							\$	39.05				\$ 3	04.21		

Notes:

1. Current water volumetric rate is \$3.59 per 1,000 Gallons up to the first 15,000 gallons per quarter.

2. The water user charges include a quarterly service charge of \$16.20 plus a public fire protection charge of \$13.20 for a 5/8 inch meter.

3. The current Sewer volumetric rate is \$3.39 per 1,000 gallons and a service charge of \$21.85 for 5/8 inch meter.

4. The usage is assumed to be 12,000 Gallons per quarter.



Table 14 Projected Impact of CIP on Typical Residential Utility Bill - Affordability

Village of Kronenwetter, WI



Notes:

1) Utility Cost taken as a 5-year average of water and wastewater bills for an average (5/8"; 12 kgal./qtr.) Residential User.

2) City Income Level from U.S. Census Bureau's American Community Survey.

3) 11.1% of residential customers are estimated to have less than \$35,000 of income. These households will have spent more than

3.47% of their income under the 4-year average for this plan.

Section 3, ItemC.

Section 3, ItemC.



Village of Kronenwetter, WI 2023 Water Rate Study Phase 1: Long-Range Cash Flow Analysis

August 1, 2023 Utility Committee Meeting

Why are we here?

- Water Utility encountering increased capital investment
- Ehlers to identify fiscal sustainability
- Our Process
 - ✓ Historical Rate Performance
 - ✓ Future Projections
 - ➢ O&M and Depreciation
 - Funding Project(s): Debt vs. Cash
 - ✓ Rate Impact



Water Rates Historical Implementation

- Last Conventional Rate Case (CRC) completed December 20, 1999.
- Since then
 - ✓ UF Plant up (added capital) 184.7%
 - ✓ O&M up 40%; Depr. Up 62%
 - ✓ Usage & Cust. Count up 170%
 - ✓ 2022 PSC AR ROR = 14.64%
- No Simplified Rate Cases (SRC) completed since CRC.



Water: Historical Rate Performance

		Shown w	ith no incre	ase			
Rev	enue Requirement					Est	Budget
Component	Description	2018	2019	2020	2021	2022	2023
Cash Basis							
1	O&M and PILOT	\$483,487	\$497,410	\$505,191	\$420,465	\$341,802	\$510,342
2	Debt	\$113,015	\$0	\$0	\$0	\$0	\$0
3	Cash Funded Capital ^A	\$121,568	\$108,975	\$31,300	\$46,378	\$54,744	\$40,000
	Less:						
	Other Revenue	\$39,810	\$42,021	\$45,198	\$45,699	\$45,737	\$31,360
	Interest Income	\$6,201	\$8,568	\$6,395	\$4,363	\$3,942	\$15,000
	Revenue Requirement (Costs less Other Income)	\$672,059	\$555,796	\$484,898	\$416,781	\$346,867	\$503,982
	User Rates Revenue	\$702,723	\$688,576	\$752,008	\$780,577	\$793,875	\$752,500
	Rate Adequacy	\$30,665	\$132,780	\$267,110	\$363,796	\$447,008	\$248,518
	Rate Adjustment Needed	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
Utility Basis (P	SC)						
1	O&M and PILOT	\$483,487	\$497,410	\$505,191	\$420,465	\$341,802	\$510,342
2	Depreciation	\$85,155	\$88,205	\$90,070	\$91,305	\$93,223	\$106,483
	NIRB	\$2,862,116	\$2,885,208	\$2,867,720	\$2,810,223	\$2,645,311	\$3,130,171
	PSC Benchmark ROR (%)	4.90%	5.70%	4.90%	4.90%	4.90%	6.50%
3	PSC Benchmark ROR (\$)	\$140,244	\$164,457	\$140,518	\$137,701	\$129,620	\$203,461
	Less:						
	Other Revenue	\$39,810	\$42,021	\$45,198	\$45,699	\$45,737	\$31,360
	Interest Income	\$6,201	\$8,568	\$6,395	\$4,363	\$3,942	\$15,000
	Revenue Requirement (Costs less Other Income)	\$662,875	\$699,483	\$684,186	\$599,409	\$514,966	\$773,926
	User Rates Revenue	\$702 723	\$688 576	\$752.008	\$780 577	\$793 875	\$752 500
	Rate Adequacy	\$39,848	(\$10,907)	\$67,822	\$181,168	\$278,909	(\$21,426)
	Rate Adjustment Needed	0.00%	1.58%	0.00%	0.00%	0.00%	2.85%

Rates performing on a cash basis; can add 248k D.S.

Section 3, ItemC.

Let's investigate the his ²⁵ further....

Notes:

^AIncludes annual capital not funded with debt and recommended debt coverage at 1.1x annual debt payment

Water: Historical Financial Indicators



Reserves - Actual vs. Target

Reserves to fund deficits and capital (5 mo. O&M + Debt = Target)



What happens when we add capital...

26

Future Capital

000000000, 1001110.

Projects	Funding	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	Totals
Water Meter Change Out	Cash	40,000	40,000	40,000								120,000
Water Filtration Project	Revenue Debt	1,050,000	2,525,000									3,575,000
Water & Sewer GIS System	Cash		50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	450,000
10 Year Well Inspection	Cash			50,000				50,000				100,000
Well 3	Revenue Debt										4,000,000	4,000,000
Actual CIP Costs		1,090,000	2,615,000	140,000	50,000	50,000	50,000	100,000	50,000	50,000	4,050,000	8,245,000
Sources of Funding		2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	
G.O. Debt		0	0	0	0	0	0	0	0	0	0	0
Revenue Debt		1,050,000	2,525,000	0	0	0	0	0	0	0	4,000,000	7,575,000
Grants/Aids		0	0	0	0	0	0	0	0	0	0	0
Special Assessment		0	0	0	0	0	0	0	0	0	0	0

0

140,000

140.000

0

50,000

50,000

0

50,000

50,000

0

50,000

50,000

0

100,000

100.000

0

50,000

50.000

0

50,000

50,000

Well 3 project offset by 2.2M cash as seen in Table 7

0

90,000

2.615.000

0

40,000

1.090.000



User Fees

Cash

Total

0

50,000

4.050.000

0

670,000

8.245.000

Water: Future Projection

Section 3, ItemC.

	Budget					Projected				
	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032
Revenues										
Total Revenues from User Rates ¹	\$752,500	\$752,500	\$775,075	\$798,327	\$822,277	\$846,945	\$872,354	\$898,524	\$925,480	\$1,136,70
Percent Increase to User Rates	0.00%	0.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	22.82%
Cumulative Percent Rate Increase Dollar Amount Increase to Revenues	0.00%	0.00% \$0	3.00% \$22 ,575	6.09% \$23,252	9.27% \$23,950	12.55% \$24,668	15.93% \$25,408	19.41% \$26,171	22.99% \$26,956	51.06% \$211,22
Total Other Revenues	\$49,360	\$46,824	\$47,292	\$47,765	\$48,242	\$48,725	\$49,212	\$49,704	\$50,537	\$51,386
Total Revenues	\$801,860	\$799,324	\$822,367	\$846,092	\$870,519	\$895,670	\$921,566	\$948,229	\$976,018	\$1,188,09
Less: Expenses										
Operating and Maintenance ²	\$510,342	\$515,445	\$520,600	\$525,806	\$531,064	\$536,375	\$541,738	\$547,156	\$552,627	\$558,154
PILOT Payment	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Net Before Debt Service and Capital Expenditures	\$291,518	\$283,878	\$301,767	\$320,286	\$339,455	\$359,296	\$379,827	\$401,073	\$423,390	\$629,93
Debt Service										
Existing Debt P&I	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
New (2023-2032) Debt Service P&I	\$0	\$85,106	\$231,722	\$231,672	\$231,621	\$231,569	\$231,515	\$231,459	\$231,402	\$291,42
I otal Debt Service	\$0	\$85,106	\$231,722	\$231,672	\$231,621	\$231,569	\$231,515	\$231,459	\$231,402	\$291,42
Transfer In (Out)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Less: Capital Improvements	\$1,090,000	\$2,615,000	\$140,000	\$50,000	\$50,000	\$50,000	\$100,000	\$50,000	\$50,000	\$4,134,600
Debt Proceeds	\$1,050,000	\$2,525,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$2,060,000
Net Annual Cash Flow	\$251,518	\$108,772	(\$69,955)	\$38,614	\$57,834	\$77,727	\$48,313	\$119,613	\$141,988	(\$1,736,090
Restricted and Unrestricted Cash Balance:										
Balance at first of year	\$1,735,651	\$1,987,169	\$2,095,941	\$2,025,986	\$2,064,599	\$2,122,434	\$2,200,161	\$2,248,473	\$2,368,087	\$2,510,07
Net Annual Cash Flow Addition/(subtraction)	\$251,518	\$108,772	-\$69,955	\$38,614	\$57,834	\$77,727	\$48,313	\$119,613	\$141,988	-\$1,736,090
Balance at end of year	\$1,987,169	\$2,095,941	\$2,025,986	\$2,064,599	\$2,122,434	\$2,200,161	\$2,248,473	\$2,368,087	\$2,510,075	\$773,98
"All-in" Debt Coverage	N/A	3.34	1.30	1.38	1.47	1.55	1.64	1.73	1.83	2.16
PSC Days Cash on Hand	1,331	1,184	1,112	1,132	1,164	1,207	1,232	1,300	1,380	28 222

Notes:

1) Assumes no changes in customer count or usage beyond Test Year.

2) Assumes 1.00% annual inflation beyond budget year.

Legend:

Simplified Rate Case (projected eligibility) Conventional (Full) Rate Case

Water: Impact on Avg. Res. Bill

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	Water								Sewe	r	_				_		
Year	Increase	Water Vol. Charge ¹	Water User Charge ²	Utility Bill (Quarterly)	Change C Prior Ye	ver ar	Increase	Sewer Vol. Charge ³	Sewer User Charge ³	Utility Bill (Quarterly)	Change Over Pri Year	e or	U (/	tility Bill Annual)	Change Over Prior Year	% of MHI (84,435)	Year
		Tiered	Serv. + PFP					<u>1,000 Gal</u>	Gen Service								
2022		3.59	29.40	\$ 72.48				3.39	21.85	\$ 62.53			\$	540.04		0.64%	2022
2023	0.00%	3.59	29.40	\$ 72.48	\$	-	0.00%	3.39	21.85	\$ 62.53	\$		\$	540.04	\$ -	0.64%	2023
2024	0.00%	3.59	29.40	\$ 72.48	\$	-	8.00%	3.66	23.60	\$ 67.53	\$ 5	00	\$	560.05	\$ 20.01	0.66%	2024
2025	3.00%	3.70	30.28	\$ 74.65	\$ 2	.17	8.00%	3.95	25.49	\$ 72.93	\$ 5	40	\$	590.36	\$ 30.31	0.70%	2025
2026	3.00%	3.81	31.19	\$ 76.89	\$ 2	.24	8.00%	4.27	27.52	\$ 78.77	\$ 5	83	\$	622.66	\$ 32.30	0.74%	2026
2027	3.00%	3.92	32.13	\$ 79.20	\$ 2	.31	5.00%	4.48	28.90	\$ 82.71	\$ 3	94	\$	647.64	\$ 24.98	0.77%	2027
2028	3.00%	4.04	33.09	\$ 81.58	\$ 2	.38	5.00%	4.71	30.35	\$ 86.84	\$ 4	14	\$	673.68	\$ 26.05	0.80%	2028
2029	3.00%	4.16	34.08	\$ 84.02	\$ 2	.45	5.00%	4.94	31.86	\$ 91.19	\$ 4	34	\$	700.84	\$ 27.16	0.83%	2029
2030	3.00%	4.29	35.11	\$ 86.54	\$ 2	.52	5.00%	5.19	33.46	\$ 95.75	\$ 4	56	\$	729.16	\$ 28.32	0.86%	2030
2031	3.00%	4.42	36.16	\$ 89.14	\$ 2	.60	3.00%	5.35	34.46	\$ 98.62	\$ 2	87	\$	751.04	\$ 21.87	0.89%	2031
2032	22.82%	5.42	44.41	\$ 109.49	\$ 20	.34	3.00%	5.51	35.49	\$ 101.58	\$ 2	96	\$	844.25	\$ 93.21	1.00%	2032
Total Change	e over plann	ning period			\$ 37	.01					\$ 39.	05			\$ 304.21		

Notes:

1. Current water volumetric rate is \$3.59 per 1,000 Gallons up to the first 15,000 gallons per quarter.

2. The water user charges include a quarterly service charge of \$16.20 plus a public fire protection charge of \$13.20 for a 5/8 inch meter.

3. The current Sewer volumetric rate is \$3.39 per 1,000 gallons and a service charge of \$21.85 for 5/8 inch meter.

4. The usage is assumed to be 12,000 Gallons per quarter.



Rate Comparison – By County (2)

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Utility Name	County	Utility Class	Min. Qtrly Bill (0.625 inch meter)	6000 GAL	12000 GAL	15000 GAL	18750 GAL	75000 GAL	Effective Date
Junction City Water Utility	Portage	D	\$57.00	\$129.60	\$202.20	\$238.50	\$261.38	\$594.50	6/27/2018
Maine Water Utility	Marathon	D	\$57.06	\$125.16	\$193.26	\$227.31	\$269.87	\$908.31	1/1/2022
Village of Dorchester Water Utility	Marathon	D	\$54.00	\$99.00	\$144.00	\$166.50	\$194.63	\$578.25	9/26/2013
Abbotsford Municipal Water Utility	Marathon	D	\$30.90	\$80.94	\$130.98	\$156.00	\$187.28	\$656.40	8/27/2015
Stratford Municipal Water and Electric Utility	Marathon	D	\$33.00	\$81.00	\$129.00	\$153.00	\$183.00	\$549.75	7/19/2017
Village of Amherst Water Utility	Portage	D	\$38.19	\$77.01	\$115.83	\$135.24	\$159.50	\$490.14	4/29/2022
Wausau Water Utility	Marathon	AB	\$25.65	\$70.29	\$114.93	\$137.25	\$165.15	\$583.65	7/1/2023
Spencer Municipal Water Utility	Marathon	D	\$34.20	\$69.90	\$105.60	\$123.45	\$145.76	\$450.20	1/1/2014
Mosinee Municipal Water And Sewer Utility	Marathon	С	\$36.00	\$69.36	\$102.72	\$119.40	\$140.25	\$427.80	4/1/2022
City of Colby Municipal Water Utility	Marathon	D	\$35.52	\$67.50	\$99.48	\$115.47	\$135.46	\$415.92	9/15/2022
Village of Water Marathon and Sewer Utility	Marathon	D	\$34.50	\$65.10	\$95.70	\$111.00	\$130.13	\$390.00	4/1/2016
Marshfield Utilities	Marathon	AB	\$28.44	\$59.80	\$91.16	\$106.84	\$126.44	\$420.44	7/1/2019
Kronenwetter Water Utility (PLAN 51%)	Marathon	С	\$24.47	\$57.01	\$89.55	\$105.82	\$125.24	\$416.70	TBD
Rothschild Municipal Water Utility	Marathon	С	\$29.06	\$57.80	\$86.54	\$100.91	\$118.87	\$388.31	10/1/2022
Athens Municipal Water Utility	Marathon	D	\$23.67	\$53.79	\$83.91	\$98.97	\$117.80	\$384.42	1/1/2022
Village of Hatley Water Utility	Marathon	D	\$39.91	\$45.23	\$77.15	\$93.11	\$113.06	\$329.96	1/1/2023
Schofield Municipal Water and Sewer Utility	Marathon	С	\$27.40	\$51.70	\$76.00	\$88.15	\$103.34	\$308.20	9/10/2022
Edgar Municipal Water Utility	Marathon	D	\$24.12	\$49.68	\$75.24	\$88.02	\$104.00	\$324.92	1/1/2021
Whiting Municipal Water And Sewer Utility	Portage	D	\$18.90	\$43.08	\$67.26	\$79.35	\$94.46	\$307.90	7/13/2013
Kronenwetter Water Utility (INITIAL 3%)	Marathon	С	\$16.69	\$38.87	\$61.06	\$72.15	\$85.40	\$284.13	TBD
Kronenwetter Water Utility CURRENT	Marathon	С	\$16.20	\$37.74	\$59.28	\$70.05	\$82.91	\$275.85	12/20/1999
Village of Plover Municipal Water Utility	Portage	AB	\$18.00	\$37.98	\$57.96	\$67.95	\$80.44	\$267.30	4/1/2022
Weston Water Utility	Marathon	AB	\$25.08	\$40.50	\$57.46	\$67.48	\$80.01	\$301.18	10/15/2022
Stevens Point Municipal Water Utility	Portage	AB	\$29.66	\$41.18	\$52.70	\$58.46	\$65.66	\$173.66	12/1/2021
Rib Mountain San Dist	Marathon	С	\$34.99	\$36.93	\$48.57	\$54.39	\$61.67	\$163.59	7/1/2023

No PFP (charged different by utility)



Sorted by 12 kgal consumption column

Recommendations

- Not eligible for SRC based on 2022 PSC AR results
- This plan identifies
 - ✓ max use of SRC where available then CRC
 - Projected eligibility upon release of 2024 PSC report (5/1/25)
 - ✓ 2032 projected solved for min. coverage; not PSC rate adjustment



Questions?

Section 3, ItemC.



August 1, 2023

2023 SEWER RATE STUDY:

Village of Kronenwetter, WI

Phase I: Long-Range Cash Flow Analysis



Prepared by:

Ehlers N19W24400 Riverwood Drive, Suite 100 Waukesha, WI 53188 Advisors:

Brian Roemer *Municipal Advisor* Greg Johnson *Senior Municipal Advisor*

BUILDING COMMUNITIES. IT'S WHAT WE DO.

2023 Sewer Rate Study

Section 1 — Historical Analysis



Table 1Sewer Rate Performance

Village of Kronenwetter, WI

Revenue Requirement						Est	Est
Component	t Description	2018	2019	2020	2021	2022	2023
Cash Basis							
1	Operating and Maintenance	\$460,425	\$548,509	\$557,352	\$460,190	\$540,933	\$635,621
2	Debt	\$0	\$0	\$0	\$0	\$0	\$0
3	Cash Funded Capital	\$10,383	\$0	\$17,629	\$97,591	\$70,750	\$110,000
	Less:	\$00.000	¢ 54.070	\$00.407	¢00.450	¢4.004	¢4 500
	Other Revenue	\$28,666	\$51,872	\$29,167	\$33,452	\$4,894	\$4,500
	Interest Income	\$11,783	\$15,710	\$11,689	\$7,635	\$7,016	\$21,000
	(Costa loss Other Income)	\$430,359	\$400,92 <i>1</i>	\$034,120	\$516,694	\$599,773	\$720,121
	(Costs less Other Income)						
	User Rates Revenue	\$600,118	\$594,179	\$655,122	\$664,497	\$660,000	\$660,000
	Rate Adequacy	\$169,759	\$113,252	\$120,997	\$147,803	\$60,227	(\$60,121)
	Rate Adjustment Needed	0.00%	0.00%	0.00%	0.00%	0.00%	9.11%
Utility Basis (F	PSC)						
1	Operating and Maintenance	\$460,425	\$548,509	\$557,352	\$460,190	\$540,933	\$635,621
2	Depreciation	\$215,317	\$217,691	\$219,926	\$222,261	\$217,957	\$221,070
	NIRB	\$13 002 288	\$9 531 609	\$0 100 801	\$0 /31 103	\$0 210 <i>1</i> 21	\$9.088.726
з	Typical ROI (2%)	\$270.846	\$100 632	\$180,818	\$188 622	ψ3,213,421 \$184 388	\$1,000,720 \$1,81,775
5		ψ215,040	ψ100,002	ψ100,010	ψ100,022	ψ104,000	φ101,775
	Less:						
	Other Revenue	\$28,666	\$51,872	\$29,167	\$33,452	\$4,894	\$4,500
	Interest Income	\$11,783	\$15,710	\$11,689	\$7,635	\$7,016	\$21,000
	Revenue Requirement	\$915,139	\$889,250	\$926,240	\$829,986	\$931,369	\$1,012,965
	(Costs less Other Income)						
	User Rates Revenue	\$600,118	\$594,179	\$655,122	\$664,497	\$660,000	\$660,000
	Rate Adequacy	(\$315,021)	(\$295,071)	(\$271,118)	(\$165,489)	(\$271,369)	(\$352,965)
	Rate Adjustment Needed	52.49%	49.66%	41.38%	24.90%	41.12%	53.48%

Notes:

Ancludes recommended debt coverage at 1.1x annual debt payment



Table 2Sewer Utility Rate Performance Charts






Table 3Sewer Utility Cash Flow Analysis - Historical 2018-2022

Village of Kronenwetter, WI

		Act	ual		Estimated
	2018	2019	2020	2021	2022
Revenues					
Total Revenues from User Rates	\$600,118	\$594,179	\$655,122	\$664,497	\$660,000
Percent Increase to User Rates	0.00%	0.00%	0.00%	0.00%	0.00%
Total Other Revenues	\$40,449	\$67,582	\$41,606	\$41,087	\$11,910
Total Revenues	\$640,567	\$661,761	\$696,728	\$705,584	\$671,910
Less: Expenses					
Operating and Maintenance	\$460,425	\$548,509	\$557,352	\$460,190	\$540,933
PILOT Payment	\$3,895	\$4,173	\$4,801	\$4,599	\$5,000
Net Before Debt Service and Capital Expenditures	\$176,247	\$109,079	\$134,575	\$240,795	\$125,977
Existing Debt P&I	\$0	\$0	\$0	\$0	\$0
Transfer In (Out)	\$0	\$0	\$0	\$0	\$0
Less: Capital Improvements	\$10,383	\$0	\$17,629	\$97,591	\$70,750
Debt Issued/Grants/Aid	\$0	\$0	\$0	\$0	\$0
Reconcile to Audit	(\$35,949)	(\$6,561)	(\$27,842)	(\$38,728)	\$0
Net Annual Cash Flow	\$129,915	\$102,518	\$89,104	\$104,476	\$55,227
Restricted and Unrestricted Cash Balance:					
Balance at first of year	\$911,215	\$1,041,130	\$1,143,648	\$1,232,752	\$1,337,228
Net Annual Cash Flow Addition/(subtraction)	\$129,915	\$102,518	\$89,104	\$104,476	\$55,227
Balance at end of year	\$1,041,130	\$1,143,648	\$1,232,752	\$1,337,228	\$1,392,455
Notes:					



Table 4Sewer Utility Financial Benchmarking Analysis

Village of Kronenwetter, WI

		Act	ual		Estimated	Budget
	2018	2019	2020	2021	2022	2023
Target minimum cash balance						
Target minimum working capital - Ehlers ¹	319,250	323,866	284,355	316,204	356,954	366,118
Actual Days Cash Available - PSC ²	825	761	807	1,061	940	762
Actual Days Cash Available - Moody's ³	825	761	807	1,061	940	762
Actual Days Cash Available - S&P ⁴	825	761	807	1,061	940	762
Actual working capital-cash balance	1,041,130	1,143,648	1,232,752	1,337,228	1,392,455	1,327,334
Over (Under) Ehlers target	721,880	819,782	948,397	1,021,024	1,035,500	961,215
Over (Under) PSC target (90 days)	735	671	717	971	850	672
Over (Under) Moody's target (150 days)	675	611	657	911	790	612
Over (Under) S&P target (150 days)	675	611	657	911	790	612

Notes:

1) Target capital equals 5 mos of next year's operating expenses, including depreciation, plus 100% of debt.

2) PSC formula = O&M expense + taxes + interest on long term debt ÷ 365 to get expense per day. Then Unrestricted Cash ÷ expense per day

3) Moody's Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] - Total O&M Expenses less Depreciation

4) S&P Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] ÷ Total O&M Expenses less Depreciation; include designated reserve funds: ERFs, RSFs, etc

Rate of Return

Rate of Return						
Average Utility Plant in Service	17,328,733	13,065,469	13,202,964	13,311,359	13,317,634	13,408,009
Less: Utility Plant Accumulated Depreciation	3,336,445	3,533,860	3,712,070	3,880,256	4,098,213	4,319,283
Average Net Investment Rate Base (NIRB)	13,992,288	9,531,609	9,490,894	9,431,103	9,219,421	9,088,726
Net Operating Income	(46,958)	(120,149)	(92,989)	15,498	(93,996)	(192,191)
ROR	-0.34%	-1.26%	-0.98%	0.16%	-1.02%	-2.11%
Typical	2.00%					

Cost Recovery						
Operating Revenues	628,784	646,051	684,289	697,949	664,894	664,500
Operating Expenses incl. Depr & Amortization	675,742	766,200	777,278	682,451	758,891	856,691
Cost Recovery	0.93	0.84	0.88	1.02	0.88	0.78
Cost Recovery w/o Depr.	1.37	1.18	1.23	1.52	1.23	1.05

Notes:

This operating ratio indicates whether operating revenues (mostly charges to customers) were sufficient to cover operations and capital (in the form of depreciation) for the water and/or wastewater utility in the fiscal year. A ratio of less than 1 could be a sign of financial concern. In general, this ratio should be higher than 1 to accommodate future capital investments.

Leverage						
Total Long-Term Debt	0	0	0	0	0	0
Total Net Assets	10,874,154	10,765,542	10,714,254	10,816,759	10,724,778	10,548,588
Debt-to Equity Ratio	0.00	0.00	0.00	0.00	0.00	0.00

Notes:

This indicator measures the existing level of leveraging of assets, and is used by funders and bond rating agencies to evaluate the risk of providing additional loans to the utility. The ratio indicates the amount of long-term debt that exists for every \$1 of assets (fund equity). A utility with a ratio greater than 1.0 has more long-term debt than equity in the system's assets. There are no natural benchmarks for this indicator, and funders and bond rating agencies will assess this ratio in various ways. In general, the higher this ratio, the more likely the utility will be considered to be over-leveraged and the more difficult it will be for the utility to obtain additional loans. For this ratio, Net Assets are equal to the Net Investment Rate Base of the utility.

Condition of Assets:

3,336,445	3,533,860	3,712,070	3,880,256	4,098,213	4,319,283
7,328,733	13,065,469	13,202,964	13,311,359	13,317,634	13,408,009
16.15%	21.29%	21.95%	22.57%	23.53%	24.37%
	3,336,445 7,328,733 16.15%	3,336,445 3,533,860 7,328,733 13,065,469 16.15% 21.29%	3,336,4453,533,8603,712,0707,328,73313,065,46913,202,96416.15%21.29%21.95%	3,336,4453,533,8603,712,0703,880,2567,328,73313,065,46913,202,96413,311,35916.15%21.29%21.95%22.57%	3,336,4453,533,8603,712,0703,880,2564,098,2137,328,73313,065,46913,202,96413,311,35913,317,63416.15%21.29%21.95%22.57%23.53%

Notes:

This indicator of infrastructure condition estimates the portion of the average expected life of the utility's physical assets that has already passed. As this ratio approaches 100%, the capital assets become fully depreciated, and infrastructure needs replacement or rehabilitation. The accuracy of this indicator relies heavily on the accuracy of the depreciation schedule, and historic pricing likely distorts this indicator (newer utilities may be slightly disadvantaged as a result).



Table 5Sewer Utility Financial Health Charts

Village of Kronenwetter, WI





2023 Sewer Rate Study

Section 2 — Long-Range Cash Flow Analysis

Village of Kronenwetter, WI



Table 6

Sewer Utility Capital In	Sewer Utility Capital Improvement Plan											
Village of Kronenwetter. WI												
Projects	Funding	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	Totals
Sewer Lift Station Rebuild Program	User Fees	20,000	50,000	60,000	60,000	60,000	60,000	60,000	60,000	60,000	60,000	550,000
New Lift Station (#12): Design	Cash		50,000									50,000
New Lift Station (#12): Construction	Revenue Debt							1,000,000				1,000,000
Sewer Ordinance and Rate Study	Cash	50,000										50,000
Sewer Interceptor Capacity Review & Design	Cash				140,000							140,000
Water Meter Change Out	Cash	40,000	40,000	40,000								120,000
Water & Sewer GIS System	User Fees		50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	450,000
Vac Truck	Revenue Debt			360,000	360,000							720,000
New Storage Building/Garage (heated)	Revenue Debt		340,000									340,000
Actual CIP Costs		110,000	530,000	510,000	610,000	110,000	110,000	1,110,000	110,000	110,000	110,000	3,420,000
Sources of Funding		2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	
G.O. Debt		0	0	0	0	0	0	0	0	0	0	0
Revenue Debt		0	340,000	360,000	360,000	0	0	1,000,000	0	0	0	2,060,000
Grants/Aids		0	0	0	0	0	0	0	0	0	0	0
Special Assessment		0	0	0	0	0	0	0	0	0	0	0
User Fees/Annual Surplus		20,000	100,000	110,000	110,000	110,000	110,000	110,000	110,000	110,000	110,000	1,000,000
Tax Levy		0	0	0	0	0	0	0	0	0	0	0
Equipment Replacement Fund		0	0	0	0	0	0	0	0	0	0	0
Cash		90,000	90,000	40,000	140,000	0	0	0	0	0	0	360,000
Total		110,000	530,000	510,000	610,000	110,000	110,000	1,110,000	110,000	110,000	110,000	3,420,000

Notes:



Table 7Capital Improvements Financing Plan

Village of Kronenwetter, WI

	2024			2029	
	Revenue	Sewer		Revenue	Sewer
	Bonds	Portion		Bonds	Portion
	2024 Sewer			2029 Sewer	
	Projects			Projects	
CIP Projects ¹	1,060,000	1,060,000		1,000,000	1,000,000
Less Other Available Revenues					
Cash Available	(135,000)	(135,000)		(400,000)	(400,000)
ERF Funds	-	0		-	0
Net Borrowing Requirement	925,000	925,000		600,000	600,000
Daht Sanvica Pasanya					
Debt Service Reserve Funds On Hand		0		(95.000)	(95.000)
New Debt Service Reserve Requirement	95.000	95.000		170,000	170,000
Subtotal Reserve Fund Requirement	95,000	95,000		75,000	75,000
	55,000	55,000		, 5,000	, 3,000
Estimated Issuance Expenses	62,163	62,163		57,788	57,788
TOTAL TO BE FINANCED	1,082,163	1,082,163		732,788	732,788
Estimated Interest Earnings4.00%Assumed spend down (months)6.00	(21,200)	(21,200)	4.00% 6.00	(20,000)	(20,000)
Rounding	4,038	4,038		2,213	2,213
NET BOND SIZE	1,065,000	1,065,000		715,000	715,000
<u>Notes:</u> 1) Source of Project Totals					



Table 8

Sewer Utility Projected Debt Service Payments (PROPOSED)

Village of Kronenwetter, WI

NAME	S	ewer Reve Series	enue Bond 2024	ls	S	ewer Reve Series	nue Bono 2027	ds		PROP	OSED Sew	er Utility	Debt Service Sun	nmary
AMT		\$1,065	5,000			\$715,	,000							
DATED		6/1/2	2024			6/1/2	2029							
MATURE		5/	/1			5/	′1							
Year	Principal	Est. Rate ¹	Interest	Total	Principal	Est. Rate ²	Interest	Total	Ì	Total Prin	Total Int	Total P&I	Prin Outstanding	Year
2023									I	0	0	0		2023
2024										0	0	0	1,065,000	2024
2025	0	5.50%	82,981	82,981						0	82,981	82,981	1,065,000	2025
2026	60,000	5.50%	56,925	116,925						60,000	56,925	116,925	1,005,000	2026
2027	60,000	5.50%	53,625	113,625						60,000	53,625	113,625	945,000	2027
2028	60,000	5.50%	50,325	110,325						60,000	50,325	110,325	885,000	2028
2029	60,000	5.50%	47,025	107,025						60,000	47,025	107,025	1,540,000	2029
2030	60,000	5.50%	43,725	103,725	50,000	6.00%	59,275	109,275		110,000	103,000	213,000	1,430,000	2030
2031	60,000	5.50%	40,425	100,425	50,000	6.00%	38,400	88,400		110,000	78,825	188,825	1,320,000	2031
2032	60,000	5.50%	37,125	97,125	50,000	6.00%	35,400	85,400		110,000	72,525	182,525	1,210,000	2032
2033	60,000	5.50%	33,825	93,825	50,000	6.00%	32,400	82,400		110,000	66,225	176,225	1,100,000	2033
2034	60,000	5.50%	30,525	90,525	50,000	6.00%	29,400	79,400		110,000	59,925	169,925	990,000	2034
2035	60,000	5.50%	27,225	87,225	50,000	6.00%	26,400	76,400		110,000	53,625	163,625	880,000	2035
2036	60,000	5.50%	23,925	83,925	50,000	6.00%	23,400	73,400		110,000	47,325	157,325	770,000	2036
2037	60,000	5.50%	20,625	80,625	50,000	6.00%	20,400	70,400		110,000	41,025	151,025	660,000	2037
2038	60,000	5.50%	17,325	77,325	50,000	6.00%	17,400	67,400		110,000	34,725	144,725	550,000	2038
2039	60,000	5.50%	14,025	74,025	50,000	6.00%	14,400	64,400		110,000	28,425	138,425	440,000	2039
2040	60,000	5.50%	10,725	70,725	50,000	6.00%	11,400	61,400		110,000	22,125	132,125	330,000	2040
2041	55,000	5.50%	7,563	62,563	55,000	6.00%	8,250	63,250		110,000	15,813	125,813	220,000	2041
2042	55,000	5.50%	4,538	59,538	55,000	6.00%	4,950	59,950		110,000	9,488	119,488	110,000	2042
2043	55,000	5.50%	1,513	56,513	55,000	6.00%	1,650	56,650		110,000	3,163	113,163	0	2043
2044	0	5.50%	0		0	6.00%	0			0	0	0	0	2044
TOTALS	1.065.000		603,969	1,668,969	715,000		323,125	1,038,125	ŀ	1,780,000	927,094	2,707,094		TOTALS

Notes:

1) Rate assumes recent WI/TE/Rev/BQ sale plus 50 bps (or 0.50%).

2) Rate assumes previous proposed plan issue plus 50 bps (or 0.50%).

Table 9 Sewer Utility Cash Flow Analysis - Projected 2023-2032

Village of Kronenwetter, WI

	Budget					Projected				
	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032
Revenues										
Total Revenues from User Rates ¹	\$660,000	\$712,800	\$769,824	\$831,410	\$872,980	\$916,629	\$962,461	\$1,010,584	\$1,040,901	\$1,072,129
Percent Increase to User Rates	0.00%	8.00%	8.00%	8.00%	5.00%	5.00%	5.00%	5.00%	3.00%	3.00%
Cumulative Percent Rate Increase	0.00%	8.00%	16.64%	25.97%	32.27%	38.88%	45.83%	53.12%	57.71%	62.44%
Dollar Amount Increase to Revenues		\$52,800	\$57,024	\$61,586	\$41,570	\$43,649	\$45,831	\$48,123	\$30,318	\$31,227
Total Other Revenues	\$25,500	\$25,598	\$25,696	\$25,794	\$25,894	\$25,993	\$26,094	\$26,195	\$26,297	\$26,399
Total Revenues	\$685,500	\$738,398	\$795,520	\$857,204	\$898,874	\$942,623	\$988,555	\$1,036,779	\$1,067,198	\$1,098,527
Less: Expenses	#005 004	*• • • • • • • • • •	\$ 004,000	* 074 500	\$ 000.047	#7 04 777	A745 040	A7 00 400	A7 4 4 7 4 4	# 750.000
Operating and Maintenance	\$635,621	\$648,333	\$661,300	\$674,526	\$688,017	\$701,777	\$715,812	\$730,129	\$744,731	\$759,626
FILOT Fayment	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000
Net Before Debt Service and Capital Expenditures	\$44,879	\$85,064	\$129,219	\$177,678	\$205,857	\$235,846	\$267,742	\$301,650	\$317,467	\$333,901
Daht Saturiaa										
Existing Debt P&I	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
New (2023-2032) Debt Service P&I	\$0 \$0	\$0	\$82,981	\$116.925	\$113.625	\$110.325	\$107.025	\$213.000	\$188.825	\$182.525
Total Debt Service	\$0	\$0	\$82,981	\$116,925	\$113,625	\$110,325	\$107,025	\$213,000	\$188,825	\$182,525
T () (0)	\$ 0	^	•••	A -0	••	•••	\$ 0	A A	\$ 0	^
I ransfer In (Out)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Less: Capital Improvements	\$110,000	\$592,163	\$510,000	\$610,000	\$110,000	\$110,000	\$1,167,788	\$110,000	\$110,000	\$110,000
Debt Issued/Grants/Aid	\$0	\$1,065,000	\$0	\$0	\$0	\$0	\$715,000	\$0	\$0	\$0
Net Annual Cash Flow	(\$65,121)	\$557,902	(\$463,762)	(\$549,247)	(\$17,768)	\$15,521	(\$292,070)	(\$21,350)	\$18,642	\$41,376
Destricted and User stricted Oracle Delances										
Restricted and Unrestricted Cash Balance: Balance at first of year	\$1 302 /55	\$1 327 334	\$1 885 235	\$1 A21 A7A	\$872 227	\$854 459	9869 980	\$577.010	\$556 560	\$575 201
Net Annual Cash Flow Addition/(subtraction)	(\$65,121)	\$557,902	(\$463,762)	(\$549 247)	(\$17,768)	\$15 521	(\$292,070)	(\$21,350)	\$18 642	\$41 376
Balance at end of year	\$1,327,334	\$1,885,235	\$1,421,474	\$872,227	\$854,459	\$869,980	\$577,910	\$556,560	\$575,201	\$616,578
"All-in"Debt Coverage	N/A	N/A	1.56	1.52	1.81	2.14	2.50	1.42	1.68	1.83
Notes:				Legend:						
 Assumes no changes in customer count or usage be 	evond Test Year.			lr	ncrease depicted	to maintain wit	h assumed O&M	inflation		
2) Assumes 2.00% annual inflation beyond budget yea	r.			 Ir	ncrease needed	above inflationa	ary adjustment			



Table 10Sewer Utility Financial Benchmarking Analysis Projected 2023 - 2032

Village of Kronenwetter, WI

	Budget					Projected				
	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032
Target minimum cash balance										
Target minimum working capital - Ehlers ¹	366,118	462,598	510,457	519,636	523,771	533,177	657,131	640,742	642,350	643,514
Actual Days Cash Available - PSC ²	762	1,061	697	435	421	422	277	244	255	270
Actual Days Cash Available - Moody's ³	762	1,008	732	421	363	364	208	193	199	215
Target minimum working capital - S&P ⁴	762	1,008	732	421	363	364	208	193	199	215
Actual working capital-cash balance	1,327,334	1,885,235	1,421,474	872,227	854,459	869,980	577,910	556,560	575,201	616,578
Over (Under) Ehlers target	961,215	1,422,638	911,017	352,591	330,688	336,803	(79,221)	(84,182)	(67,148)	(26,936)
Over (Under) PSC target (90 days)	672	971	607	345	331	332	187	154	165	180
Over (Under) Moody's target (150 days)	612	858	582	271	213	214	58	43	49	65
Over (Under) S&P target (150 days)	612	858	582	271	213	214	58	43	49	65

Notes:

1) Target capital equals 5 mos of next year's operating expenses, including depreciation, plus 100% of debt.

2) PSC formula = O&M expense + taxes + interest on long term debt ÷ 365 to get expense per day. Then Unrestricted Cash ÷ expense per day

3) Moody's Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] ÷ Total O&M Expenses less Depreciation

4) S&P Formula = [(Unrestricted Cash + Liquid Investments) * 365 days] ÷ Total O&M Expenses less Depreciation; include designated reserve funds: ERFs, RSFs, etc

Rate of Return										
Average Utility Plant in Service	13,408,009	13,728,009	14,248,009	14,808,009	15,168,009	15,278,009	15,888,009	16,498,009	16,608,009	16,718,009
Less: Utility Plant Accumulated Depreciation	4,319,283	4,549,634	4,799,414	5,069,365	5,355,774	5,646,268	5,953,220	6,289,006	6,628,876	6,972,829
Average Net Investment Rate Base (NIRB)	9,088,726	9,178,375	9,448,595	9,738,644	9,812,235	9,631,741	9,934,789	10,209,003	9,979,133	9,745,180
Net Operating Income	(192,191)	(161,339)	(136,665)	(108,431)	(96,763)	(70,911)	(55,527)	(50,506)	(38,827)	(26,529)
ROR	-2.11%	-1.76%	-1.45%	-1.11%	-0.99%	-0.74%	-0.56%	-0.49%	-0.39%	-0.27%
Typical	2.00%									



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Cost Recovery										
Operating Revenues	664,500	717,345	774,414	836,046	877,663	921,359	967,238	1,015,409	1,045,774	1,077,050
Operating Expenses incl. Depr & Amortization	856,691	878,684	911,080	944,477	974,426	992,270	1,022,765	1,065,915	1,084,601	1,103,579
Cost Recovery	0.78	0.82	0.85	0.89	0.90	0.93	0.95	0.95	0.96	0.98
Cost Recovery w/o Depr.	1.05	1.11	1.17	1.24	1.28	1.31	1.35	1.39	1.40	1.42

Notes:

This operating ratio indicates whether operating revenues (mostly charges to customers) were sufficient to cover operations and capital (in the form of depreciation) for the water and/or wastewater utility in the fiscal year. A ratio of < 1 could be a sign of financial concern. In general, this ratio should be > 1 to accommodate future capital investments.

Leverage										
Total Long-Term Debt	0	1,065,000	1,065,000	1,005,000	945,000	885,000	1,540,000	1,430,000	1,320,000	1,210,000
Total Net Assets	10,548,588	10,341,138	10,137,597	9,988,399	9,854,222	9,749,249	9,605,227	9,468,091	9,366,863	9,284,286
Debt-to Equity Ratio	0.00	0.10	0.11	0.10	0.10	0.09	0.16	0.15	0.14	0.13

Notes:

This indicator measures the existing level of leveraging of assets, and is used by funders and rating agencies to evaluate the risk of providing additional loans to the utility. The ratio indicates the amount of long-term debt that exists for every \$1 of assets (fund equity). A utility with a ratio > 1 has more long-term debt than equity in the system's assets. There are no natural benchmarks for this indicator, and funders and rating agencies will assess this ratio in various ways. In general, the higher this ratio, the more likely the utility will be considered to be over-leveraged and the more difficult it will be for the utility to obtain additional loans. Net Assets are equal to the Net Investment Rate Base of the utility.

Condition of Assets:										
Accumulated Depreciation Expense	4,319,283	4,549,634	4,799,414	5,069,365	5,355,774	5,646,268	5,953,220	6,289,006	6,628,876	6,972,829
Average Total Plant in Service	13,408,009	13,728,009	14,248,009	14,808,009	15,168,009	15,278,009	15,888,009	16,498,009	16,608,009	16,718,009
Asset Depreciation	24.37%	24.89%	25.20%	25.50%	26.10%	26.98%	27.26%	27.60%	28.53%	29.43%

Notes:

This indicator of infrastructure condition estimates the portion of the average expected life of the utility's physical assets that has already passed. As this ratio approaches 100%, the capital assets become fully depreciated, and infrastructure needs replacement or rehabilitation. The accuracy of this indicator relies heavily on the accuracy of the depreciation schedule, and historic pricing likely distorts this indicator (newer utilities may be slightly disadvantaged as a result).



Table 11Sewer Utility Statement of Projected Revenue Bond Coverage

Village of Kronenwetter, WI

		Less:		Existing Rev Debt	Future Rev Debt (2023-2032)			
Year	Total Operating Revenues	Total O&M Expense	Amount Available for Debt Service	Total	Total	Total Sewer Debt Service	Coverage	Debt Service Capacity @ 1.25x
2023	685,500	(635,621)	49,879	-	-	-	N/A	39,903
2024	738,398	(648,333)	90,064	-	-	-	N/A	72,051
2025	795,520	(661,300)	134,219	-	82,981	82,981	1.62	24,394
2026	857,204	(674,526)	182,678	-	116,925	116,925	1.56	29,217
2027	898,874	(688,017)	210,857	-	113,625	113,625	1.86	55,061
2028	942,623	(701,777)	240,846	-	110,325	110,325	2.18	82,352
2029	988,555	(715,812)	272,742	-	107,025	107,025	2.55	111,169
2030	1,036,779	(730,129)	306,650	-	213,000	213,000	1.44	32,320
2031	1,067,198	(744,731)	322,467	-	188,825	188,825	1.71	69,148
2032	1,098,527	(759,626)	338,901	-	182,525	182,525	1.86	88,596
					_	_		

Notes:

1) Revenue Coverage determined from PROPOSED 2024 Revenue Bonds.



Table 12Sewer Utility Long-Range Planning Analysis

Village of Kronenwetter, WI





2023 Sewer Rate Study

Section 3 — Rate Impact Analysis

Village of Kronenwetter, WI



Table 13Projected Impact of CIP on Typical Residential Utility Bill

Village of Kronenwetter, WI

			Wat	er		_			Sewe	er		_		_		_			
Year	Increase	Water Vol.	Water User	U (Q	tility Bill uarterly)	Change Over Prior Year	Increase	Sewer Vol.	Sewer User Charge ³		Utility Bill (Quarterly)	Chai Over	nge Prior ar		Utility Bill (Annual)	0	Change ver Prior Vear	% of MHI (84,435)	Year
		Tiered	Serv + PFP					1 000 Gal	Gen Service			10		ŀ		-	rear		
2022		3.59	29.40	\$	72.48			3.39	21.85	\$	62.53				\$ 540.04			0.64%	2022
2023	0.00%	3.59	29.40	\$	72.48	\$ -	0.00%	3.39	21.85	\$	62.53	\$	-		\$ 540.04	\$	-	0.64%	2023
2024	0.00%	3.59	29.40	\$	72.48	\$ -	8.00%	3.66	23.60	\$	67.53	\$	5.00		\$ 560.05	\$	20.01	0.66%	2024
2025	3.00%	3.70	30.28	\$	74.65	\$ 2.17	8.00%	3.95	25.49	\$	72.93	\$	5.40		\$ 590.36	\$	30.31	0.70%	2025
2026	3.00%	3.81	31.19	\$	76.89	\$ 2.24	8.00%	4.27	27.52	\$	78.77	\$	5.83		\$ 622.66	\$	32.30	0.74%	2026
2027	3.00%	3.92	32.13	\$	79.20	\$ 2.31	5.00%	4.48	28.90	\$	82.71	\$	3.94		\$ 647.64	\$	24.98	0.77%	2027
2028	3.00%	4.04	33.09	\$	81.58	\$ 2.38	5.00%	4.71	30.35	\$	86.84	\$	4.14		\$ 673.68	\$	26.05	0.80%	2028
2029	3.00%	4.16	34.08	\$	84.02	\$ 2.45	5.00%	4.94	31.86	\$	91.19	\$	4.34		\$ 700.84	\$	27.16	0.83%	2029
2030	3.00%	4.29	35.11	\$	86.54	\$ 2.52	5.00%	5.19	33.46	\$	95.75	\$	4.56		\$ 729.16	\$	28.32	0.86%	2030
2031	3.00%	4.42	36.16	\$	89.14	\$ 2.60	3.00%	5.35	34.46	\$	98.62	\$	2.87		\$ 751.04	\$	21.87	0.89%	2031
2032	22.82%	5.42	44.41	\$	109.49	\$ 20.34	3.00%	5.51	35.49	\$	101.58	\$	2.96		\$ 844.25	\$	93.21	1.00%	2032
Total Chang	e over planı	ning period				\$ 37.01						\$ 3	39.0 5			\$	304.21		

Notes:

1. Current water volumetric rate is \$3.59 per 1,000 Gallons up to the first 15,000 gallons per quarter.

2. The water user charges include a quarterly service charge of \$16.20 plus a public fire protection charge of \$13.20 for a 5/8 inch meter.

3. The current Sewer volumetric rate is \$3.39 per 1,000 gallons and a service charge of \$21.85 for 5/8 inch meter.

4. The usage is assumed to be 12,000 Gallons per quarter.



Table 14 Projected Impact of CIP on Typical Residential Utility Bill - Affordability

Village of Kronenwetter, WI



Notes:

1) Utility Cost taken as a 5-year average of water and wastewater bills for an average (5/8"; 12 kgal./qtr.) Residential User.

2) City Income Level from U.S. Census Bureau's American Community Survey.

3) 11.1% of residential customers are estimated to have less than \$35,000 of income. These households will have spent more than

3.47% of their income under the 4-year average for this plan.

Section 3, ItemC.

Section 3, ItemC.



Village of Kronenwetter, WI 2023 Sewer Rate Study Phase 1: Long-Range Cash Flow Analysis

August 1, 2023 Utility Committee Meeting

Why are we here?

- Sewer Utility experiencing higher O&M expenses and planning for capital investment
- Ehlers to identify fiscal sustainability
- Our Process
 - ✓ Historical Rate Performance
 - ✓ Future Projections
 - ➢ O&M, Depreciation, and PILOT
 - Funding Project(s): Debt vs. Cash



Sewer Rates Historical Implementation

- Last sewer rate increase went into effect on in three phases in 2015
- The increase was 15% increase in total to general service and volume:

- February 25, 2015
 - Base Rate- was \$19.00 now \$19.95
 - ✓ Consumption-was \$2.95 now \$3.09
- March 25, 2015
 - \checkmark Base Rate-was \$19.95 now \$20.90
 - Consumption-was \$3.09 now \$3.24
- April 25, 2015
 - Base Rate- was \$20.90 now \$21.85
 - Consumption- was \$3.24 now \$3.39





Sewer: Historical Rate Performance

Shown with no increase Est **Revenue Requirement** Est 2023 Component Description 2018 2019 2020 2021 2022 Cash Basis Operating and Maintenance \$460,425 \$548,509 \$557.352 \$460,190 \$540,933 \$635.621 2 Debt \$0 \$0 \$0 \$0 \$0 \$0 3 Cash Funded Capital \$10.383 \$0 \$17.629 \$97,591 \$70,750 \$110.000 Less: Other Revenue \$28,666 \$51.872 \$29,167 \$33,452 \$4.894 \$4,500 Interest Income \$11,783 \$15,710 \$11.689 \$7.635 \$7.016 \$21,000 **Revenue Requirement** \$430.359 \$480,927 \$534,125 \$516,694 \$599.773 \$720,121 (Costs less Other Income) User Rates Revenue \$600,118 \$660.000 \$594,179 \$655,122 \$664,497 \$660,000 Rate Adequacy \$169,759 \$113,252 \$120,997 \$147,803 \$60,227 (\$60,121) 9.11% Rate Adjustment Needed 0.00% 0.00% 0.00% 0.00% 0.00% Utility Basis (PSC) \$460,425 \$548,509 \$557,352 \$540,933 \$635,621 Operating and Maintenance \$460,190 \$219,926 \$217.957 2 Depreciation \$215.317 \$217.691 \$222.261 \$221.070 NIRB \$13,992,288 \$9,531,609 \$9,490,894 \$9,431,103 \$9,219,421 \$9.088.726 3 Typical ROI (2%) \$279.846 \$190.632 \$189.818 \$188.622 \$184.388 \$181.775 Less: Other Revenue \$28,666 \$51,872 \$33,452 \$4,894 \$4,500 \$29,167 \$11,783 \$15,710 \$11,689 \$7,635 \$7,016 Interest Income \$21,000 \$915,139 \$889.250 \$926.240 \$829,986 \$931.369 \$1.012.965 Revenue Requirement (Costs less Other Income) User Rates Revenue \$600,118 \$594,179 \$655,122 \$664,497 \$660,000 \$660,000 (\$271,369) (\$352,965) Rate Adequacy (\$315,021) (\$295.071) (\$271.118)(\$165,489) Rate Adjustment Needed 52.49% 41.38% 24.90% 41.12% 53.48% 49.66%

Notes:

^Includes recommended debt coverage at 1.1x annual debt payment

Increase in O&M puts pressure on rates

Remove ROR (0) and still not funding depreciation

Let's investigate the his ⁵⁵ further....



Op Ratio Incl Depr

Target



Future Capital

Projects	Funding	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	Totals
Sewer Lift Station Rebuild Program	User Fees	20,000	50,000	60,000	60,000	60,000	60,000	60,000	60,000	60,000	60,000	550,000
New Lift Station (#12): Design	Cash		50,000									50,000
New Lift Station (#12): Construction	Revenue Debt							1,000,000				1,000,000
Sewer Ordinance and Rate Study	Cash	50,000										50,000
Sewer Interceptor Capacity Review & Design	Cash				140,000							140,000
Water Meter Change Out	Cash	40,000	40,000	40,000								120,000
Water & Sewer GIS System	User Fees		50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	50,000	450,000
Vac Truck	Revenue Debt			360,000	360,000							720,000
New Storage Building/Garage (heated)	Revenue Debt		340,000									340,000
Actual CIP Costs		110,000	530,000	510,000	610,000	110,000	110,000	1,110,000	110,000	110,000	110,000	3,420,000

Sources of Funding	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	
G.O. Debt	0	0	0	0	0	0	0	0	0	0	0
Revenue Debt	0	340,000	360,000	360,000	0	0	1,000,000	0	0	0	2,060,000
Grants/Aids	0	0	0	0	0	0	0	0	0	0	0
Special Assessment	0	0	0	0	0	0	0	0	0	0	0
User Fees/Annual Surplus	20,000	100,000	110,000	110,000	110,000	110,000	110,000	110,000	110,000	110,000	1,000,000
Tax Levy	0	0	0	0	0	0	0	0	0	0	0
Equipment Replacement Fund	0	0	0	0	0	0	0	0	0	0	0
Cash	90,000	90,000	40,000	140,000	0	0	0	0	0	0	360,000
Total	110,000	530,000	510,000	610,000	110,000	110,000	1,110,000	110,000	110,000	110,000	3,420,000

• Beyond Cash & Annual Surplus listed above proposed debt downsized with cash as depicted on Table 7



Sewer: Future Projection

Section 3, ItemC.

	Budget					Projected					
	2023	2024	2025	2026	2027	2028	2029	2030	2031	203	32
Revenues											
Total Revenues from User Rates ¹	\$660,000	\$712,800	\$769,824	\$831,410	\$872,980	\$916,629	\$962,461	\$1,010,584	\$1,040,901	\$1,0	072,129
Percent Increase to User Rates	0.00%	8.00%	8.00%	8.00%	5.00%	5.00%	5.00%	5.00%	3.00%		3.00%
Cumulative Percent Rate Increase Dollar Amount Increase to Revenues	0.00%	8.00% \$52,800	16.64% \$57,024	25.97% \$61,586	32.27% \$41,570	38.88% \$43,649	45.83% \$45,831	53.12% \$48,123	57.71% \$30,318	\$	62.44% 631,227
Total Other Revenues	\$25,500	\$25,598	\$25,696	\$25,794	\$25,894	\$25,993	\$26,094	\$26,195	\$26,297	\$2	26,399
Total Revenues	\$685,500	\$738,398	\$795,520	\$857,204	\$898,874	\$942,623	\$988,555	\$1,036,779	\$1,067,198	\$1,09	98,527
Less: Expenses											
Operating and Maintenance	\$635,621	\$648,333	\$661,300	\$674,526	\$688,017	\$701,777	\$715,812	\$730,129	\$744,731	\$75	59,626
PILOT Payment	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	S	\$5,000
Net Before Debt Service and Capital Expenditures	\$44,879	\$85,064	\$129,219	\$177,678	\$205,857	\$235,846	\$267,742	\$301,650	\$317,467	\$33	33,901
Debt Service											
Existing Debt P&I	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0		\$0
New (2023-2032) Debt Service P&I	\$0	\$0	\$82,981	\$116,925	\$113,625	\$110,325	\$107,025	\$213,000	\$188,825	\$18	82,525
Total Debt Service	\$0	\$0	\$82,981	\$116,925	\$113,625	\$110,325	\$107,025	\$213,000	\$188,825	\$18	82,525
Transfer In (Out)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0		\$0
Less: Capital Improvements	\$110.000	\$592,163	\$510,000	\$610.000	\$110.000	\$110.000	\$1,167,788	\$110.000	\$110.000	\$1 [.]	10.000
Debt Issued/Grants/Aid	\$0	\$1,065,000	\$0	\$0	\$0	\$0	\$715,000	\$0	\$0		\$0
Net Annual Cash Flow	(\$65,121)	\$557,902	(\$463,762)	(\$549,247)	(\$17,768)	\$15,521	(\$292,070)	(\$21,350)	\$18,642	\$ 4	1,376
Restricted and Unrestricted Cash Balance:											
Balance at first of year	\$1,392,455	\$1,327,334	\$1,885,235	\$1,421,474	\$872,227	\$854,459	\$869,980	\$577,910	\$556,560	\$57	75,201
Net Annual Cash Flow Addition/(subtraction)	(\$65,121)	\$557,902	(\$463,762)	(\$549,247)	(\$17,768)	\$15,521	(\$292,070)	(\$21,350)	\$18,642	\$4	41,376
Balance at end of year	\$1,327,334	\$1,885,235	\$1,421,474	\$872,227	\$854,459	\$869,980	\$577,910	\$556,560	\$575,201	\$61	16,578 1
"All-in"Debt Coverage	N/A	N/A	1.56	1.52	1.81	2.14	2.50	1.42	1.68	58	1.83
										(

Notes:

1) Assumes no changes in customer count or usage beyond Test Year.

2) Assumes 2.00% annual inflation beyond budget year.

Legend:

Increase depicted to maintain with assumed O&M inflation Increase needed above inflationary adjustment

Sewer: Future Projection

- Annual surpluses going away
 - ✓ RM Metro Treatment
 - ✓ Salaries
- To fund 3.2M Capital need mix of cash and debt
- Plan uses cash to benchmark adjusts revenues to meet financial obligations



Reserves - Actual vs. Target

Sewer: Impact on Avg. Res. Bill

			Wate	er					Sewe	r		_			_			
Year	Increase	Water Vol. Charge ¹	Water User Charge ²	Utility (Quar	y Bill terly)	Change Over Prior Year	Increase	Sewer Vol. Charge ³	Sewer User Charge ³	(Utility Bill Quarterly)	C Ov	hange er Prior Year	Utility Bill (Annual)	(0\	Change ver Prior Year	% of MHI (84,435)	Year
		<u>Tiered</u>	<u>Serv. + PFP</u>					<u>1,000 Gal</u>	Gen Service									
2022		3.59	29.40	\$	72.48			3.39	21.85	\$	62.53			\$ 540.04			0.64%	2022
2023	0.00%	3.59	29.40	\$	72.48	\$ -	0.00%	3.39	21.85	\$	62.53	\$	-	\$ 540.04	\$	-	0.64%	2023
2024	0.00%	3.59	29.40	\$	72.48	\$ -	8.00%	3.66	23.60	\$	67.53	\$	5.00	\$ 560.05	\$	20.01	0.66%	2024
2025	3.00%	3.70	30.28	\$	74.65	\$ 2.17	8.00%	3.95	25.49	\$	72.93	\$	5.40	\$ 590.36	\$	30.31	0.70%	2025
2026	3.00%	3.81	31.19	\$	76.89	\$ 2.24	8.00%	4.27	27.52	\$	78.77	\$	5.83	\$ 622.66	\$	32.30	0.74%	2026
2027	3.00%	3.92	32.13	\$	79.20	\$ 2.31	5.00%	4.48	28.90	\$	82.71	\$	3.94	\$ 647.64	\$	24.98	0.77%	2027
2028	3.00%	4.04	33.09	\$	81.58	\$ 2.38	5.00%	4.71	30.35	\$	86.84	\$	4.14	\$ 673.68	\$	26.05	0.80%	2028
2029	3.00%	4.16	34.08	\$	84.02	\$ 2.45	5.00%	4.94	31.86	\$	91.19	\$	4.34	\$ 700.84	\$	27.16	0.83%	2029
2030	3.00%	4.29	35.11	\$	86.54	\$ 2.52	5.00%	5.19	33.46	\$	95.75	\$	4.56	\$ 729.16	\$	28.32	0.86%	2030
2031	3.00%	4.42	36.16	\$	89.14	\$ 2.60	3.00%	5.35	34.46	\$	98.62	\$	2.87	\$ 751.04	\$	21.87	0.89%	2031
2032	22.82%	5.42	44.41	\$	109.49	\$ 20.34	3.00%	5.51	35.49	\$	101.58	\$	2.96	\$ 844.25	\$	93.21	1.00%	2032
Total Change	e over plann	ning period				\$ 37.01						\$	39.05		\$	304.21		

Notes:

1. Current water volumetric rate is \$3.59 per 1,000 Gallons up to the first 15,000 gallons per quarter.

2. The water user charges include a quarterly service charge of \$16.20 plus a public fire protection charge of \$13.20 for a 5/8 inch meter.

3. The current Sewer volumetric rate is \$3.39 per 1,000 gallons and a service charge of \$21.85 for 5/8 inch meter.

4. The usage is assumed to be 12,000 Gallons per quarter.



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Recommendations

- Determine timing for rate adjustment(s) (unregulated)
 - ✓ Analysis depicts 1/1/2024 implementation
- Determine customer engagement
- As applicable, move forward with Phase 2 to identify Sewer Rate adjustment by customer class developing fair and equitable rates
 - \checkmark % across the board vs. COSS
 - ✓ Category B users



Questions?

Section 3, ItemC.



Appendix B Water Utility Rate Study

Scope of Service

Client has requested that Ehlers prepare a user rate study for its water utility. ("Project"). Ehlers proposes and agrees to provide the following scope of services:

Phase I - Information Request, Review, and Long-Range Cash Flow Analysis

- Under this phase we will assess the need for a Conventional Rate Case with the PSC using a long-range cash flow analysis. This analysis will make projections on future operation expenses, future capital funding, and identify future rate increases.
- Prepare a cash flow analysis for the next 10 years including the test year and beyond. The analysis will include:
 - Calculation of the return on net investment rate base (ROI) adequate to finance the appropriate share of debt service, equipment replacement and capital outlay expenses.
 - Benchmarking of key financial metrics that the PSC, rating agencies, and prospective lenders analyze.
 - Capital planning and debt schedules with corresponding coverage requirements.
- This phase includes a meeting at the Board or other designated meeting to present the outcome of the Long-Range Cash Flow Analysis before starting the Application.
- In order to complete this phase Ehlers will need to request and review the following:
 - Capital planning documents identifying estimated costs for future water projects through 2032
 - o Annual audits for the past three years (we currently have this information).
 - o 2022 Year to date Water Fund actual expenses and revenues.
 - 2023 Water Fund line-item budget.

Phase II - Information Request, Review, and Test Year 2023 PSC Conventional Application (as necessary)

- Under this phase we will complete the Test Year 2023 PSC Conventional Rate Case Application including all attachments of the application and supplementary information.
- To complete this phase Ehlers will need to request and review the following:

- PSC annual reports for the last three years (available on the PSC website).
- Current annual debt service schedules for existing utility debt (we currently have this information).
- For calendar years 2020, 2021, and 2022 detailed water billing records showing billed water consumption by customer class and rate block and number of customers by class and meter size.
 - Based on the time of filing the Application, we may request a similar report for the previous twelve months to the time of filing.
- Water billing records which list the 4 largest users in each customer class (i.e. residential, commercial, industrial, public authority) including the name of the customer, meter size, and total billed consumption for the largest quarter over the last 12-month period.
- A water tower repainting schedule showing when the last time the tower(s) were repainted, the cost for repainting and whether the utility is on a 15 or 20-year repainting schedule.
- Current number of un-metered customers within the utility, if any.
- Most current depreciation schedule for all water utility assets, showing current year depreciation expense, depreciation rates, and accumulated depreciation for all water utility financed assets.
- List of 4 largest users in each customer class (i.e. residential, commercial, industrial, public authority) including the name of the customer, meter size, and total billed consumption for the largest guarter over the last 12-month period.
- The current number of private fire protections by the size of connection, if any.
- For municipal financed utility plant in service and contributed plant in service, the estimated 2022 and 2023 asset additions, retirements and adjustments.
- The current percentage allocated to the sewer utility's portion of meter costs and assets. (Usually the depreciation of the meters is split 50/50 between water and sewer).
- o Estimated materials and supplies inventory for 2022 and 2023, if any.
- For 2022 and 2023 (estimated) the number of feet of main and hydrants added and retired. Please classify additions and retirements as routine or major.
- If employees perform work for more than one function, please explain how costs are assigned to the water utility. For example, when an employee performs work for municipal parks, sewer, water, and private lead service lines, describe how the salary and wages dollars are assigned to the regulated water utility.

- Water utility credit card billing offering information (details to follow)
- This phase includes a meeting with the Board or other designated meeting to present the outcome of the Application before filing the Application.
- Ehlers will file the Application upon receiving desired recommendation to do so from the Client's desired governing body or staff.

Phase III - Test Year 2023 PSC Conventional Proceedings (as necessary)

- Assist utility with Data Request Portion of proceedings
- Review Revenue Requirement to check for PSC errors or omissions based on Application and Data Request(s) period. Provide disagreement correspondence as necessary
- Review PSC Cost of Service Study & Rate Design
- Represent the Utility at required PSC public hearing
 - Be present at the required telephonic public hearing and provide testimony in support of the proposed water rates for the test year on behalf of the Village.
- File Rate Implementation Letter

Phase IV - Final Report and Presentation (as necessary)

- Prepare and provide (via PDF or paper copy) a report containing a written summary of results of the PSC Rate Case and cash flow analysis along with all supporting worksheets.
- (Optional) If requested, this phase includes a meeting with the Board or other designated meeting to present the PSC final water rate structure for the test year and answer questions This should be requested on or before filing the PSC Rate Implementation Letter.

Compensation

In return for the services set forth in the "Scope of Service," Client agrees to compensate Ehlers as follows based on the following Scope of Service Events:

Phase	Scope of Service Event	Fee
1	LRCFA Delivered to Client	\$ 3,000
Н	CRC Application Filed with PSC*	\$ 4,500
111	Completion of PSC Rate Implementation Letter*	\$ 3,000
IV	Final Report Delivered to Client*	\$ 500
IV	Final Report Presentation [^]	\$ 500
	Total	\$ 11,500

*As necessary. Phase I may indicate the remainder of the Study is not needed.

- To complete this phase Ehlers will need to request and review the following:
 - o Current schedule of sewer rates.
 - Annual audits for the past five years. (We have this information on file).
 - Year to date actual expenses and revenues.
 - Latest line-item budget.
 - Current annual debt service schedules for existing utility debt. (We have this information on file).
 - o Any available capital improvement plan documents.

Phase II - Report, Presentation(s), & Implementation

- Draft Report
 - Meet with Village staff virtually (phone or web-based service) to discuss initial findings
- Final Report and Presentation
 - Prepare a report including all project tables and a brief presentation describing the findings and recommendations of the LRCFA.
 - o Review the report with staff and make any appropriate changes.
 - Prepare a final report and submit via PDF or paper copy
 - Prepare and be available for one (1) presentation of the report and findings to the Village Board or other designated governing body.
- Implementation
 - Assist utility in determining implementation date
 - Provide updated rate schedules for implementation
 - Discuss proper implementation process as it relates to the municipality's ordinance

Phase III - Utility Rate Study (as necessary)

- Under this phase we will complete the Sewer Rate Study. This analysis will include:
 - Development of Revenue Requirements
 - Based on the available budget, debt and asset detail, develop the revenue requirements for the utility under the cash based or utility-based method.
 - Cost of Service Study
 - Allocate the revenue requirements for the test year to the appropriate utility functions.
 - o Rate Design



Robert J. Roth, P.E., President 315 DeWitt Street, Portage, WI 53901 (608) 571-3205 robert@rpsprofessionalsolutions.com prpsprofessionalsolutions.com

PROGRESS REPORT

To: Village of Kronenwetter, Utility Committee

From: Robert J. Roth, PE

Re: Lift Station Assessment & Sewer Capacity Study

Date: July 26, 2023

The Village of Kronenwetter commissioned a Lift Station Assessment & Sewer Capacity Study in January/February 2023. Roth Professional Solutions (RPS) was awarded that work on March 7, 2023. The contract was later executed on March 14, 2023.

RPS coordinated with B&M Technical Services, whom the Village has worked extensively with in the past on its lift stations. Several of the Lift Station pumps have been provided by B&M. RPS initially met with Mark Mackey and Dan Hekrdle as a kick-off on April 4, 2023.

The Lift Stations were inspected by the above-referenced team on April 25, 2023. This formed the basis of the operation and condition assessment of the Village's eleven (11) lift stations. Attached with this memo are the eleven (11) lift station field evaluation reports. The evaluation of each station included a visual inspection as well as discussion on operation and maintenance. This identified key issues with each station, summarized in the table on the following page.

Issues of high or immediate importance are further summarized as follows:

- LS #3 High Maintenance Issues
- LS #6 Add-a-Phase Conversion System Replacement (Electrical)
- LS #7 Gas Issues
- LS #8 Electrical Issues, Pump Issues, Likely Capacity Issues
- LS #11 Vortexing, Debris Accumulation
- Long Term Need for 277-480V 3-Phase Power Wherever Possible
- Original Pumps in LS #5, 6, & 10

		Lift S	Station Cor	ndition As	ssessment S	Summary	– Genera	l Categorie	es	
Lift Sta	Site Cond.	Structure Condition	Electrical	Valve Vault	Wet-Well	Generator	Controls	Pumps	Valves	Other
1	OK	Duplex Submersible IVV, Good	OK, but Prefer 480V 3Ph	OK	OK	Onsite	OK	25 HP, 625 GPM Shinmaywa OK	OK	High Importance, Main LS
2	OK	Duplex Submersible IVV Deep but OK	Ok, Needs 480V 3Ph	Clogged Drain, But OK Overall	OK	Portable	Upgrade	25 HP, 275 HP, Shinmaywa OK	OK	High Importance, Collector LS
3	OK	USEMCO Vacuum Prime LS Refurbished 2016	208V 3Ph Ok	Some Minor Issues but OK	ОК	Portable	OK	3 HP, 80 GPM, Fairbanks Morse Centrifical	OK	Faulty Primer Valve, Doesn't Stay Primed, Maintenance Intensive
9	Ok	Duplex Submersible IVV, OK	208V 3Ph w/ VFD OK	OK	OK	Portable	OK	3.7 HP, 140 GPM, Barnes, Ebarra	OK	4" Pump Discharge Piping to 6" FM OK
10	Too Close to Road, Salt Issues	Submersible IVV, Concrete Condition Issues Throughout	OK with 1Ph Power, But Prefer 3Ph Power for Future	OK	OK	Portable	OK	2.8 HP, 80 GPM, Barnes	OK	Significant Importance for Future Areas, Currently Moderate Importance
4	OK	Duplex Submersible IVV, OK	208V 3 Ph, OK but Prefer 480V 3Ph	OK	OK	Portable	Older Panel, Painted but OK	10 HP, 175 GPM Shinmaywa	No Iso Valve	High Importance, Collector LS
5	OK	Duplex Submersible IVV, OK	208V 3 Ph, OK	OK	OK	Portable	Older Panel, Painted but OK	10 HP, 280 GPM Barnes	OK	Moderate Importance
6	OK	Duplex Submersible IVV, OK	Add-A- Phase Conversion System NG	OK	OK Some 3" Influent Pipe Corrosion	Portable	OK	15 HP, 155 GPM Barnes	OK	Moderate Importance Address Electric & Panel Issue
7	OK	Duplex Submersible IVV, Gas Issues Require Conc. Protection	208V 3 Ph, OK	OK	Gas Issues Require Concrete Treatment	Onsite	OK	15 HP 550 GPM Shinmaywa	OK	High Importance, Main LS , Gas Issues
8	OK	Duplex Submersible IVV, Deep But OK	Phase Faults, Power Loss Issues, Overheating Need 480V 3Ph, Panel Refurbish	Deep Some Water But OK	Likely Undersized	Portable	Adjust- ment Required	Shinmaywa 5 HP OK, Ebarra 5 HP Not Working, Replaced with 10HP Shinmaywa	OK	High Importance, Collector LS, Likely LS Capacity Issues, Possible FM Issues
11	Ok	Duplex Submersible IVV, OK	240V, 1Ph w/ VFD & Phase Conversion System	OK	Some Vortexing Excessive Debris Issues	Portable	OK	5 HP, 100 GPM, Barnes Chopper	OK	Traditionally has had Clogging Issues

The Lift Stations are also part of the Sewer Capacity Study, for the determination of basin size and flow capacity for both existing and future conditions. If a particular lift station requires maintenance now, and also requires for replacement or upsizing via the capacity study, then the planning of operation & maintenance costs versus capital costs can commence with all the information at hand.

Within the Sewer Capacity Study, other items to be studied include the following:

- Limiting Factors of Existing Sewer Infrastructure (interceptors, lift stations)
- Capacity Estimation of Existing Sewer Infrastructure
- Required Upgrades for Existing Conditions
- Sewer Serviceability of Future Planning Areas
- Impact on Existing Sewer Infrastructure from New Development

Together, a comprehensive look at the sewer infrastructure will be completed with active recommendations for immediate and future planning periods. The most immediate recommendations are for operation and maintenance items, such as electrical upgrades, pump replacements or concrete/structure maintenance.

We have recently obtained pump cut sheets, usage data, and as-built plan records from Village Staff and we have begun the process of evaluating that information. So far we have determined, unfortunately, that it is not feasible to eliminate Lift Station #3. This is based on a review of the as-built maps, depths, and relative distances. The lift station will remain a source of high maintenance given its configuration. Since this station was refurbished in 2016, we will likely not be recommending it for immediate replacement. However, we will still look at flow capacity and overall future development potential and if this station would require upsizing. If so, we would recommend it be refurbished to a duplex submersible with an above-ground valve vault where the existing wetwell can be retained and utilized.

Currently, we are focusing on Lift Station #8 which includes flow from Lift Station #11. We are starting our analysis with a look at wastewater flow and pumping records. We believe this station is undersized, including its 4" forcemain discharge, and will only be further undersized with its service of the TID 2 area in the future near Beranek and Maple Ridge Roads. If this station requires improvements and capital costs, perhaps it can be included within the TID 2 expenditures. We will continue to evaluate and make recommendations therefrom.

As for timing, we will be trying to catch up to the original schedule to continue efforts in supplying recommendations and costs for budgeting purposes in September, 2023.

**** END OF PROGRESS REPORT ****



		Section 3 ItemD
-		
	LEGEND:	
	NORTHEAST BASIN:	
	LIFT STATION 1 BASIN	
	LIFT STATION 2 BASIN	
	LIFT STATION 3 BASIN	
	LIFT STATION 9 BASIN	
	LIFT STATION 10 BASIN	
	1-39 BASIN:	
	LIFT STATION 6 BASIN	
	LIFT STATION 7 BASIN	
	LIFT STATION 8 BASIN	
	LIFT STATION 4 BASIN	
	LIFT STATION 5 BASIN	
	LIFT STATION 11 BASIN	
	LIFT STATION	
	L	
FLOW ORDER	<u>:</u>	

NORTH EAST BASIN FLOW SEQUENCE:

LIFT 3 » LIFT 1 » ROTHSCHILD LIFT 9 » LIFT 1 » ROTHSCHILD LIFT 10 » LIFT 2 » LIFT 1 » ROTHSCHILD

I-39 BASIN FLOW SEQUENCE:

LIFT 11 » LIFT 8 » LIFT 4 » LIFT 5 » LIFT 7 » ROTHSCHILD LIFT 6 » LIFT 7 » ROTHSCHILD

NOTE: ARROWS REPRESENT GENERAL FLOWAGE

N	0 1	250	2500	DATE:	07/25/2023
W E S	SCALE: 1*= 2500EEET			DESIGNED BY:	RJR
	(PRINTEL	- 2300FEET DAT 11"x 17")		DRAWN BY:	
	PROJECT NO:	202	3-XXX	SHEET:	70

		4
10	#	
LO	H+	

Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location:	1929 Kimberly Rd, Mosinee, WI	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible	
Engineer:	Roth Professional Solutions	nical Se	rvices		
House Kee	eping: 📕 Good 🗌 N/A 🗌 Poor Lighting	Tripping Hazards Present No Fall Protectio Force Heater Inoperable Potential for Shock or	n 🗌 Electrocu	Exposure to Raw Wastewater in Dry Well ition 🗌 Other	

Health and Safety Issues:

Other Observations:

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments		
Site Improvement (SIM)							
* Access Driveway	X						
* Parking	X						
* Gate and Fencing							
* Site Drainage	X						
* Grounding System	X						
* Site Lighting							
* Site Alarm Horn and Strobe Lighting	X						
General Site Electrical Observa	tions						
Access Driveway Details: Gravel or aggregate basecourse only Concrete Pavement Bituminous Pavement							
Fence Details: Chain	Link Other	Fencing Height (ft):	F	encing Length (ft): None		
Gate Type: Single Double N/A							
Traffic: Other	· [] Site too Close	o Traffic				
Grounding System Present Grounding Rings Grounding Rods Details :							
If applicable, approximate parking area:							
If applicable, approximate site area:							
Other Notes:							



LS # <mark>1</mark>____

Roth Professional Solutions

Section 3, ItemD.

LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Structure and Wetwell (PST)								
* Building	N/A							
Building Structures:	Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:							
Field Observations: Good N/A Roof Degraded Doors and Security Failing Needs Paint								
* Odor Control		 ✓ 						
Odor Details: Ve	nt Pipe	Other	Details					
Field Observations: O	perational and in use ther	On site,	but not required	Do	es not oper	ate, needs i	repair	
* Crane/Hoist		✓					Portable Off-Site	
Crane Details: Mai	nufacturer:		Model:		Se	rial Number	r:	
Field Observations: Go	od operating conditic her	on 🗌 Does n	iot operate, requ	iires repair	Mou	nting Hard	ware intact	
* Bar Screen or Com minuter	N/A							
System Description:	No Bar Screen	Manually Raked	Bar Screen	Mechanio	cally Raked	Bar Screen	Screen Bypass Provided?	
Mechanical Bar Screens:	Manufacturer:		Model:	Seri	al Number:		Power Requirements (hp):	
Odor Details: N/A	A Screens need	frequent cleaning	g 🗌 Short	t repsonse t	ime	Odor fly r	nuisance 🗌 Screens not in use	
* Flow Meter	N/A							
Type: 🗌 N,	/А Туре:	M	anufacturer:		Model:		Serial Number:	
Flow Meter Field Observat	ions: 🗌 Operation	al		🗌 L	ocation			
	Other							
* Wet Well		~						
Walls: 📕 Concr	ete 🗌 Steel	Fiberglass						
Slab/Cover: 📕 Reinfo	orced Concrete	Steel Pur	mps, motors and	d electric p	anel are n	nounted or	n cover/slab directly over wet well	
Pump Control System:	Floats Bubble	er System	Ultrasonic & Tra	nsducer				
Measurement (PPM):								
Wet Well Field Observations: 📕 Good 🗌 PN/A 🔄 Hatch Damaged or Difficult to Open 📄 Wet Structure Spalling or Cracked								
Evidence of Concrete Corrosion Wet Well Needs Cleaning - Solids/Grease Other								
Hatch Field Observations: Good Fair: Minor Corrosion to Hatches, Hinges, or Latches Poor:Corroded or Broken Hatches, Hinges, or Latches								
Other								
Wet Well Ladder Observations: Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion Poor: Corroded or Broken Steps; Corroded or Broken Wall Anchors Other								
Wet Well Wall Observations: Good Concrete Sealant Peeled or Cracked: Concrete Soft at Surface								
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other								
Slab/Cover Observations: 🔳 Good 🗌 Fair: Concrete or Aluminum Grate Slightly Corroded But Safe								
Poor: Concrete Aggregate Missing/Exposed; Grate Corroded or Warped; Debris Over Platform Other								


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LIFT STATION CONDITION ASSESSMENT FORM											
Asset Class CMMS Code Asset Year Cond. Perf. Utiliz. Field Observations/Comments Present Installed Rank Rank (%)											
Influent Pipe Observations: 🔳 Good 📋 Fair: Slight Corrosion; Pipe Intact 📄 Poor: Severe Pipe Corrosion 🗌 Other											
Alarm Float Observations: Good Fair: Some Grease But Operating Properly Poor: Covered in Grease or Broken Other											
Pump Vent Line Observations: Good Fair: Slight Corrosion But Operates Properly; Needs Sealant Around Opening											
Poor: Any One Vent Does Not Operate; Corroded or Broken Off at Wall 🔳 Other Transducer w/Float Back Up											
* Dry Well N/A											
Location Type: None Underground pump vault with access tube and ladder Located below grade inside building											
Lighting: Yes No											
Access Tube and Ladder Field Observations: N/A Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion											
Building Floor Slabs: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface											
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Dother											
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface											
Building Walls:											
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other											
Sump Pump: No Yes Type Model: Power (hp): TDH: Serial:											
Field Observations: Not Operational Poor Floor Drainage Other											
* Cathodic Protection N/A											
Field Observations: Disconnected Other											
HVAC (HVA)											
* Dry Well HVAC N/A											
Asset Size:											
Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Ventilation Duct Work Corroded Belts Loose or Torn Louvers Roof Vents Other											
* Wet Well HVAC											
Asset Size:											
Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn Ventilation Duct Work Corroded Louvers Roof Vents Other											
Electrical Systems (ELE)											
* Control Panel											
Asset Size (Volts) 208 VAC											
Manufacturer: Emergencies Model: Serial Number:											
Power Supply Manufacturer: US Filter Model: Duplex Type: A.C.											



Roth Professional Solutions

Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Field Observations:	Good Panel Corro	oded Old / Exposed Wires	Outdated / Obs	solete	Contacts I able	.oose	Cables Fatigued Checked			
* Lighting Panel							ler			
Manufacturer: WPS	6 VAC 6	Model:		Serial Nur	nber:					
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Bus and.or lugs corroded Spare Spaces Available Breakers Labelled Panel Grounded Panel Labelled Other										
* Main Switch		✓								
Asset Size (Volts) 20	08 VAC									
Manufacturer:	Kohler	Model:		Serial Nur	nber: 3788	328				
Field Observations:	Good Panel Corro	oded 🗌 Old / Exposed Wires Other	Outdated / Obso	olete 🗌 Gear Worn	Contacts L	oose	Cables Fatigued Checked Panel Grounded			
* Transfer Switch		✓								
Asset Size (Volts	208 VAC Manual									
Manufacturer:	Kohler	Model: 35RZF	2	Serial Nur	mber: 378	828				
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Other Other									
* Motor Control C	Center N/A									
Asset Size (Volts)										
Manufacturer:		Model:		Serial Nun	nber:					
Field Observations:	Good Panel Corro	ded Old / Exposed Wires	Outdated / Obso	olete 🗌 iear Worn	Contacts Lo	oose	Cables Fatigued Checked Panel Labelled			
* Junction Box		~								
Asset Size (Volts)										
Manufacturer:		Model:		Serial Nun	nber:					
Field Observations:	Good Panel Corro	ded Old / Exposed Wires Other	Outdated / Obso	olete 🗌 iear Worn	Contacts Lo	oose	Cables Fatigued Checked Panel Grounded			
* Miscellaneous Pa	nel 1 N/A									
Asset Size										
Manufacturer:		Model:		Serial Nur	nber:					
Field Observations:	Good Panel Corro	oded Old / Exposed Wires Other	Outdated / Obs	olete 🗌 Gear Worn	Contacts L	oose	Cables Fatigued Checked Panel Grounded			

LS #

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Generator (GEN)										
* Emergency Generator										
* Emer. Gen. Connector										
Asset Size: Manufacturer: Model: Serial: Generator Type:										
Field Observations: Good N/A Contacts Loose Cables Fatigued Checked Engine Fluids Low Poor Housekeeping Poor Accessibility Panel Grounded Panel Labelled Diesel Containment Other										
Instrumentation (INS)										
* Auto Dialer		✓								
Manufacturer:		Model:			Phone Nu	imber:				
Alarms: 📕 High Leve	Low Level	Generator I	Running 📕 I	Power Fail	Othe	Phase F	Fail Transducer Pump 1/2			
* Float Controls										
* Bubbler Controls										
Manufacturer:	1	I	Model:	1		I				
* Ultrasonic Controls										
Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture Drain Condensate Traps in Air System Floats Tangled Controls Obsolete Other										
			SCADA	(SCA)						
Field Observations: Go	Field Observations: Good N/A Obsolete Other									
Variable Frequency Drive										
* Control Panel - VFD	N/A									
* Harmonic Filter	N/A									
* Output Filter	N/A									
Asset Size:	Manufactu	irer:		Model:			Observed RPM:			
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	aky 🗌 Other			
			Motors (N	/ITR)	1					
* Motor 1	N/A									
Asset Size (HP)										
Manufacturer:		Model:		9	erial Numb	er:				
Field Observations: Go	od N/A erheating Ne hergency Stop Button	Makes Noise eds Lubrication in Dry Well Inope	Vibrates	Shaft ricated Other	Bearing No	ise 🗌 t Failing	Opposite End Bearing Noise			
* Motor 2	N/A									
Asset Size (HP):	Manufactu	irer:		Model:			Serial Number:			
Field Observations: GC	Asset size (nr). Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Image: State (nr). Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Image: State (nr). Emergency Stop Button in Dry Well Inoperable Other									



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Hor/Vert Centrifugal Pumps										
* Pump 1	N/A									
Manufacturer:		Мос	del:			Serial Num	ber:			
Discharge Size (in)	Suction	Diameter (in)		Pump Siz	e (GPM)		TDH			
Priming Pump 🗌 🛛 Ma	anufacturer:	М	odel:		Serial	No.:	Size (hp):			
Pressure Gauge	anufacturer:		Pressure Ran	ge:			PressureReading:			
Field Observations: 🗌 🤅	Vibrating Evidence of	Shaft Sipe Strain	Deflection	ner	vitating 🗌 Belts Loose					
* Pump 2	N/A									
Discharge Size (in)	Suction D	viameter (in)		Pump Size	e (GPM)		TDH			
Priming Pump 🗌 Ma	nufacturer:	Mc	odel:		Serial N	lo.:	Size (hp):			
Pressure Gauge Ma	nufacturer:		Pressure Rang	e:			PressureReading:			
Field Observations: G	Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other									
	Submersible Pumps (SUB)									
* Pump 1		 ✓ 					SCADA Pack 32 & Telemetry			
Manufacturer:		Mod	el:		Seria	al:				
Discharge Size (in) 8"	Suction Di	ameter (in)		Pump Size (GPM) TDH 25 HP						
Field Observations: E Go	ood 🗌 N/A 🗌 her	Rail System Corroo	led 🗌 Doe	es Not Seat \	Well	Cables Co	prroded or Failing			
* Pump 2		✓								
Manufacturer:		Mod	el:	Serial:						
Discharge Size (in) 8"	Suction Di	ameter (in)		Pump Size	(GPM)		TDH			
Field Observations: E Go	bod 🗌 N/A 🗌 her	Rail System Corroo	led 🗌 Doe	es Not Seat \	Well	Cables Co	prroded or Failing			
			Check Val	ves						
* Pump 1		✓								
Size (in): <mark>8</mark> "	Manuf	acturer:		Mod	lel:		Serial No:			
Field Observations: G	Field Observations: Good N/A Valve Operator Stuck Check Valve Not Seating Check Valve No Other Operation Visible Other Operation Visible					Flange Flange Evider	es Leaking nce of Pipe Strain			
* Pump 2	N/A									
Size (in):	Manufa	acturer:		Mod	el:		Serial No:			
Field Observations: Go	od N/A N/A Not Seating	/alve Operator Stud	k 🗌 Valve heck Valve Not	Seat Leakin Operating	g	Flange	es Leaking Other			



RPS ROTH PROFESSIONAL SOLUTIONS

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Asset Class	CMMS Code	Asset	Year	Cond.	Perf.	Utiliz.	Field Observations/Comments
		Piping an	d Valves Suction	on Isolati	ion Valve	(%) S	
* Dumm 1	N1/A						
Size (in):	N/A Manuf			Mc	del:		Serial No:
Field Observations:		/alve Operator S	tuck Valve	Seat Leaki	ng	Flang	es Leaking
	Check Valve Not Seating	g	Check Valve Not	Operating		Evide	nce of Pipe Strain
* Pump 2	N/A						
Size (in):	Manuf	acturer:		Mo	del:		Serial No:
Field Observations:	Good N/A '	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaki t Operating	ng	FlangEvide	es Leaking nce of Pipe Strain
		Disch	narge Isolation	Valves			
* Pump 1	N/A						
Size (in):	Manufa	cturer:	II	Mo	del:	1	Serial No:
Field Observations:	Good N/A V Check Valve Not Seating Other	alve Operator St	uck 🗌 Valve Check Valve Not	Seat Leakiı Operating	ng	Flange	es Leaking nce of Pipe Strain
* Pump 2	N/A						
Size (in):	Manufa	acturer:		Мо	del:		Serial No:
Field Observations:	Good N/A N Check Valve Not Seating Other	/alve Operator S :	tuck 🗌 Valve Check Valve Not	Seat Leaki	ng	Flang	es Leaking nce of Pipe Strain

LS	#	2

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LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: 2	201 Tower Road, Kronenwetter, WI	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible				
Engineer:	Roth Professional Solutions	Technical & Equipment Assistance: B&M Technical Services						
House Keep	oing: Good N/A Poor Lighting	Tripping Hazards Present No Fall Protect reace Heater Inoperable Potential for Shock	tion	Exposure to Raw Wastewater in Dry Well tion Dther				

Health and Safety Issues: Extremely Deep Valve Vault

Other Observations: Water in valve vault; clogged drain needs 3 phase up grade

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments						
Site Improvement (SIM)											
* Access Driveway	 Image: A start of the start of										
* Parking											
* Gate and Fencing					N/A						
* Site Drainage											
* Grounding System											
* Site Lighting					N/A						
* Site Alarm Horn and Strobe Lighting	✓										
General Site Electrical Observa	ations										
Access Driveway Details:	Gravel or	aggregate based	ourse only	Conc	rete Pavement 🗌 Bituminous Pavement						
Parking Details: None	Gravel	Pavec	ł								
Fence Details: 🗌 Chain	Link 🗌 Other	Fencing Height (ft):	F	encing Length (ft): NONE						
Gate Type: Single	Double	N/A									
Traffic: 🗌 Othe	r 🗆	Site too Close	to Traffic	N/A							
Grounding System Prese Details :	Grounding System Present Grounding Rings Grounding Rods Details :										
If applicable, approximate pa	arking area: 2-3 \	/ehicles									
If applicable, approximate si	te area:										
Other Notes:											
1 Phase, 250 AMP	1 Phase, 250 AMP										



Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments					
Structure and Wetwell (PST)												
* Building							N/A					
Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:												
Field Observations: Good N/A Roof Degraded Doors and Security Failing Needs Paint Cracks on the Wall Cracks on the Floor Other												
* Odor Control		✓										
Odor Details: Vent Pipe Other Details												
Field Observations:	Field Observations: Operational and in use On site, but not required Does not operate, needs repair Image: Other Loose Vent Pipe Other Loose Vent Pipe											
* Crane/Hoist		~					Mounting Avail Hoist off-site-ok					
Crane Details: Ma	nufacturer:		Model:		Sei	rial Number	r.					
Field Observations: Go	ood operating conditio her	n 🗌 Does n	ot operate, requ	iires repair	Mou	nting Hard	ware intact					
* Bar Screen or Com minuter							N/A					
System Description:	No Bar Screen	Manually Raked	Bar Screen	Mechanio	ally Raked	Bar Screen	Screen Bypass Provided?					
Mechanical Bar Screens:	Manufacturer:		Model:	Seri	al Number:		Power Requirements (hp):					
Odor Details: N/	A Screens need	frequent cleaning	g 🗌 Shor	t repsonse t	ime	Odor fly r	nuisance Screens not in use					
Ot	her											
* Flow Meter							N/A					
Type: 🗌 N	/A Type:	M	anufacturer:		Model:		Serial Number:					
Flow Meter Field Observa	tions: 🗌 Operationa	al		L	ocation							
	Other											
* Wet Well		✓					N/A					
Walls: 📕 Conci	rete 🗌 Steel [Fiberglass										
Slab/Cover: 🔳 Reinf	orced Concrete	Steel 🗌 Pur	mps, motors and	d electric p	anel are m	nounted or	n cover/slab directly over wet well					
Pump Control System: 📕	Floats 📕 Transdu	icer	Transducer with	h High/Low	Floats							
Measurement (PPM):												
Wet Well Field Observation	ons: 📕 Good 🗌 F	PN/A 🗌 Hato	ch Damaged or D	oifficult to O	pen] Wet Stru	ucture Spalling or Cracked					
	Evidence of C	oncrete Corrosio	n 🗌 Wet V	Vell Needs	Cleaning - S	olids/Grea	ise 🗌 Other					
Hatch Field Observations:	Good Fair: N	linor Corrosion to	o Hatches, Hinge	s, or Latche	s 🗌	Poor:Corr	oded or Broken Hatches, Hinges, or Latches					
	Other											
Wet Well Ladder Observatio	ns: Good C	Fair: Surface Cor	rosion; Steps Inta	act and Soli	d; Minor An	chor Bolt C	Corrosion					
	Poor: Corre	oded or Broken S	teps; Corroded o	r Broken Wa	all Anchors [Other	N/A					
Wet Well Wall Observations:	Good Fair	: Concrete Sealar Missing Aggregat	nt Peeled or Crac te; Exposed/Missi	ked; Concre ing Re-bar	te Soft at Si	urface						
Slab/Cover Observations:	Good Fair:	Concrete or Alum	ninum Grate Sligh	ntly Corrode	d But Safe	obric Orres						
	Poor: Concrete Ag	gregate Missing/	Exposed; Grate (Corroded of	warped; D	ebris Over	Platform U Other					



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Section 3, ItemD.

LIFT STATION CONDITION ASSESSMENT FORM
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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments				
Influent Pipe Observations:	Good Fair:	Slight Corrosion;	Pipe Intact	Poor: Se	vere Pipe Co	prrosion	Other Not Visible				
Alarm Float Observations:	Alarm Float Observations: 📕 Good 🗌 Fair: Some Grease But Operating Properly 📄 Poor: Covered in Grease or Broken 🗌 Other										
Pump Vent Line Observations: Good Fair: Slight Corrosion But Operates Properly; Needs Sealant Around Opening											
	Poor: Any Or	ne Vent Does Not	Operate; Corroo	ded or Broke	en Off at W	all 🗌 Oth	her N/A				
* Dry Well							N/A				
Location Type: None Underground pump vault with access tube and ladder Located below grade inside building											
Lighting: Yes No Cathodic Protection Not Required None Yes											
Access Tube and Ladder Field Observations: N/A Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion											
] Poor: Corroded or	Broken Steps; Co	prroded or Broke	en Wall Anch	nors 🗌 C)ther					
Underground Vault Observati	ons:		od 🗌 Fair: Su	rface Corros	sion	Poor: Corr	rosion 🗌 Other				
Building Floor Slabs: N	I/A 🔄 Good 🗌	Fair: Concrete Sea	alant Peeled or C	Cracked; Cor	ncrete Soft a	at Surface					
Pc	or: Exposed/Missing	ع Aggregate; Expo	sed/Missing Re-	-bar 🗌 O	ther						
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other											
Building Walls:	 N/A Good [Fair: Concrete	e Sealant Peeled	or Cracked	; Concrete S	oft at Surfa	ice				
] Poor: Exposed/Mi	 ssing Aggregate; [Exposed/Missing	g Re-bar] Other						
Sump Pump: No Ye	es Type	Model:		Power (h	p):		 TDH: Serial:				
Field Observations: No	t Operational	Poor Floor Drain	nage 🗌 C)ther							
* Cathodic Protection							N/A				
Field Observations: Di	isconnected C	Other				<u> </u>					
			HVAC (HV/	A)							
* Dry Well HVAC				Ī			N/A				
Asset Size:	-	-									
Field Observations: Go	od N/A		/entilation Inope	erable	Makes	Noise	Fans Vibrate				
* Wet Well HVAC			Beits Loose o	riorn		/ers					
Asset Size:			L								
Field Observations: G	ood 🗌 N/A 🗌] Old 🗌 Ve	entilation Inoper	able] Makes No	oise	Fans Vibrate 🗌 Belts Loose or Torn				
U Ve	entilation Duct Work	Corroded	Louvers	Roof Vent	s 🗌 Ot	her					
Electrical Systems (ELE)											
* Control Panel		✓									
Asset Size (Volts)	<u> </u>	Single	phase] Three Ph	ase	1					
Manufacturer:		Model:		Serial Nu	mber:						
Power Supply Manufactu	urer:		Model:				Туре:				
1											



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Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Field Observations:	Good Panel Corro Dust Inside Panel	oded 🗌 Old / Exposed Wires Grounded 🔳	Outdated / Obs	solete 🗌 wings Avail d 🔳 Pa	Contacts I able	Loose	Cables Fatigued Checked Uncovered Holes her		
* Lighting Panel							N/A		
Asset Size (Volts)		II							
Manufacturer:		Model:		Serial Nur	mber:				
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Bus and or lugs corroded Spare Spaces Available Breakers Labelled Panel Grounded Panel Labelled Other									
* Main Switch									
Asset Size (Volts) 24	0v, Single Phase 250 AM	P Breaker							
Manufacturer:		Model:		Serial Nu	mber:				
Field Observations:	Good Panel Corro	oded 🗌 Old /] Exposed Wires Other	Outdated / Obso	olete 🗌 Gear Worn	Contacts L	oose	Cables Fatigued Checked Panel Grounded		
* Transfer Switch		✓							
Asset Size (Volts	240v, 3 Phase 125 AMP I	Breaker		1			-		
Manufacturer:		Model:		Serial Nu	mber:				
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other								
* Motor Control C	enter N/A								
Asset Size (Volts)				4					
Manufacturer:		Model:		Serial Nur	nber:				
Field Observations:	Good Panel Corro Dust Inside Panel	oded 🗌 Old / 🤇] Exposed Wires	Outdated / Obso	olete 🗌 iear Worn	Contacts L	corroded [Cables Fatigued Checked Panel Labelled		
* Junction Box		✓					TYPE: 3R 304 SS		
Asset Size (Volts)	60X60X14								
Manufacturer: S	SAGINOW	Model: Q.C.		Serial Nur	mber: 208	3			
Field Observations:	Good Panel Corro	oded 🗌 Old / 🤇] Exposed Wires Other	Outdated / Obso	olete 🗌 iear Worn	Contacts L	oose 🗌 Corroded [Cables Fatigued Checked Panel Grounded		
* Miscellaneous Pa	nel 1 N/A								
Asset Size									
Manufacturer:		Model:		Serial Nu	mber:				
Field Observations:	Good Panel Corre	oded Old / Exposed Wires Other	Outdated / Obs	olete 🗌 Gear Worn	Contacts L	oose	Cables Fatigued Checked Panel Grounded		



Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Generator (GEN)									
* Emergency Generator	Portable	✓					Stored off-site		
* Emer. Gen. Connector		✓							
Asset Size: N	lanufacturer:		Model:		Serial:		Generator Type:		
Field Observations: Go	ood N/A or Accessibility	Contacts Loose] Panel Grounde	Cables Fat	igued Che Labelled	cked	Engine F Diesel Co	luids Low Poor Housekeeping Intainment Other		
Instrumentation (INS)									
* Auto Dialer									
Manufacturer: SENS	APHONE	Model: 8	00		Phone Nu	mber: 715	359		
Alarms: 📕 High Leve	l 📕 Low Level	Generator	Running 📕 F	Power Fail	Othe	r			
* Float Controls	BACK-UP	✓	2 FLOAT						
Manufacturer:	<u>,</u>		Model:						
* Transducer	Submersible		Transducer				0-5 PSI		
Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture									
Dra	in Condensate Traps	in Air System	Floats Tan	gled	Controls C	bsolete	Other		
			SCADA ((SCA)					
Field Observations: Go	od 🗌 N/A 🗌	Obsolete	Other						
Variable Frequency Drive									
* Control Panel - VFD	POWER FLEX	✓	753						
* Harmonic Filter	N/A								
* Output Filter	N/A								
Asset Size:	Manufactu	irer: ALLEN B	RADLEY	Model: P	OWER FLI	ΞX	Observed RPM: 1750		
Field Observations: 📕 Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	aky 🗌 Other		
			Motors (N	/ITR)					
* Motor 1	Replaced 2022	✓							
Asset Size (HP) 20				I					
Manufacturer: SHINMA	AYWA	Model: 4CI	NX418T2E1	9	Serial Numb	er: 1885-	069		
Field Observations: Go	od N/A erheating Ne nergency Stop Button	Makes Noise eds Lubrication in Dry Well Inope	Vibrates Over Lubr erable Over C	Shaft ricated Other	Bearing No	ise 🗌 t Failing	Opposite End Bearing Noise		
* Motor 2	Replaced 2022	✓							
Asset Size (HP): 20	Manufactu	irer: SHINMAY	′WA	Model: 40	NX418T2	E1	Serial Number: 1885-070		
Field Observations: Go Co	Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other								



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
		н	or/Vert Cent	rifugal Pu	mps				
* Pump 1							N/A		
Manufac	turer:	Mo	del:			Serial Num	ber:		
Discharge Size (in)	Suction	Diameter (in)		Pump Siz	e (GPM)		TDH		
Priming Pump	Manufacturer:	N	1odel:		Serial	No.:	Size (hp):		
Pressure Gauge	Manufacturer:		Pressure Rang	ge:			PressureReading:		
Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Bearing Noise Mount Failing Evidence of Pipe Strain Other					n 🗌 Ca ^r her	vitating Delts Loose			
* Pump 2							N/A		
Discharge Size (in)	Suction E	iameter (in)		Pump Size	e (GPM)		TDH		
Priming Pump	Manufacturer:	Μ	odel:		Serial I	No.:	Size (hp):		
Pressure Gauge	Manufacturer:		Pressure Range	2:			PressureReading:		
Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other									
Submersible Pumps (SUB)									
* Pump 1		~							
Manufactu	rer:	Mod	lel:	<u>_</u>	Seri	al:			
Discharge Size (in)	Suction Di	ameter (in)		Pump Size	(GPM)		TDH		
Field Observations:	Good N/A Other	Rail System Corro	ded 🗌 Doe	es Not Seat \	Well	Cables Co	nroded or Failing		
* Pump 2		✓							
Manufactu	rer:	Mod	lel:		Seri	al:			
Discharge Size (in)	Suction Di	ameter (in)		Pump Size	(GPM)		TDH		
Field Observations:	Good N/A	Rail System Corro	ded 🗌 Doe	es Not Seat V	Well	Cables Co	rroded or Failing		
			Check Valv	/es		1			
* Pump 1		~							
Size (in):	Manuf	acturer:		Moc	lel:		Serial No:		
Field Observations:	Good N/A Check Valve Not Seatin	Valve Operator Stu	uck 🔲 Valve Check Valve Not	e Seat Leakin Operating	ng	Flange	es Leaking nce of Pipe Strain		
* Pump 2		✓							
Size (in):	Manuf	acturer:		Mod	el:		Serial No:		
Field Observations:	Good N/A	/alve Operator Stu	ck 🗌 Valve Check Valve Not	Seat Leakin Operating	g	Flange	es Leaking Other		



RPS ROTH PROFESSIONAL SOLUTIONS Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
		Piping and	l Valves Sucti	on Isolatic	on Valves	;			
* Pump 1									
Size (in):	Manu	acturer:		Mod	el:		Serial No:		
Field Observations:	Good N/A Valve Operator Stuck Valve Seat Leaking Flanges Leaking Check Valve Not Seating Check Valve Not Operating Evidence of Pipe Strain Other Other								
* Pump 2									
Size (in):	Manu	acturer:		Mod	el:		Serial No:		
Field Observations:	Good N/A Check Valve Not Seatin	Valve Operator St	uck 🗌 Valve Check Valve Not	e Seat Leakin t Operating	g	Flanges	s Leaking ce of Pipe Strain		
Discharge Isolation Valves									
* Pump 1		✓							
Size (in): 4"	Manuf	acturer:		Mode	el:		Serial No:		
Field Observations:	Good N/A Valve Operator Stuck Valve Seat Leaking Flanges Leaking Check Valve Not Seating Check Valve Not Operating Evidence of Pipe Strain								
* Pump 2		 ✓ 							
Size (in): 4"	Manuf	acturer:		Mod	el:	I	Serial No:		
Field Observations:	Good N/A Check Valve Not Seatin Other 4" OUT W/ ISC	Valve Operator Sti 3 🔲 9 VALVE	uck 🗌 Valve Check Valve Not	e Seat Leakin, Operating	3	Flanges	: Leaking ce of Pipe Strain		

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Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: 2	361 Tower Rd, Kronenwetter, WI	Municipality: Village of Kronenwetter	LS Type:	Dry Pit Vacuum Prime Duplex
Engineer:	Roth Proffessional Solutions	Technical & Equipment Assistance: B&M Tech	rvices	
House Keep	oing: 📕 Good 🔄 N/A 🗌 Poor Lighting	Tripping Hazards Present No Fall Protection Space Heater Inoperable Potential for Shock or	on 🗌 Electrocu	Exposure to Raw Wastewater in Dry Well Ition Dther

Health and Safety Issues: None

Other Observations: USEMCO ORIGINAL / LWALLEN 2016 refurbished

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments					
Site Improvement (SIM)										
* Access Driveway	X									
* Parking	X									
* Gate and Fencing										
* Site Drainage	X									
* Grounding System										
* Site Lighting										
* Site Alarm Horn and Strobe Lighting	* Site Alarm Horn and Strobe Lighting									
General Site Electrical Observations										
Access Driveway Details: Parking Details: None Parking Details: Chain Fence Details: Chain Gate Type: Single Traffic: Other Grounding Prese System Prese Details : If applicable, approximate part If applicable, approximate sit State site	Gravel or Gravel Link Other Double nt Ground rking area: N/A	aggregate based Paved Fencing Height (N/A Site too Close 1 ing Rings C	:ourse only J ft): to Traffic N Grounding R	Concr F V/A kods N/A	rete Pavement 🔳 Bituminous Pavement encing Length (ft):					
Other Notes:										
Pin Valve Issues on Vac	uum Doesn't sta	ay primed; 3 Ph	ase 208							



Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Structure and Wetwell (PST)										
* Building			*				*Sampling Bldg onsite w/generator hooku			
Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:										
Field Observations: Good N/A Roof Degraded Doors and Security Failing Needs Paint										
* Odor Control		~					NONE			
Odor Details: Vent Pipe Other Details										
Field Observations:	perational and in use other	On site,	but not required	Do	es not oper	ate, needs i	repair			
* Crane/Hoist		✓	*				*Lift Chain/Roller			
Crane Details: Ma	nufacturer:		Model:		Se	rial Numbei	r:			
Field Observations: Go	ood operating conditio	n 🗌 Does r	not operate, requ	ires repair	Mou	nting Hard	ware intact			
	her *Requires Lift Tr	uck or Portable	Lift			5				
* Bar Screen or Com minuter	N/A									
System Description:	System Description: 🗌 No Bar Screen 📄 Manually Raked Bar Screen 📄 Mechanically Raked Bar Screen 📄 Screen Bypass Provided?									
Mechanical Bar Screens: Manufacturer: Model: Serial Number: Power Requirements (hp):										
Odor Details: 🔳 N/	A Screens need	frequent cleaning	g 🗌 Shor	t repsonse t	ime	Odor fly r	nuisance 🗌 Screens not in use			
Ot	her		-							
* Flow Meter	N/A									
Туре: 🗌 N	/A Type:	М	anufacturer:		Model:		Serial Number:			
Flow Meter Field Observa	tions: 🗌 Operationa	al		L	ocation					
	Other									
* Wet Well		~					Lower Wet Well is Concrete			
Walls: 📕 Conci	rete 🔳 Steel [Fiberglass								
Slab/Cover: 🗌 Reinf	orced Concrete	Steel Pu	mps, motors and	d electric p	anel are n	nounted or	n cover/slab directly over wet well			
Pump Control System: 📕	Floats 🗌 Bubble	r System	Ultrasonic & Tra	nsducer						
Measurement (PPM):										
Wet Well Field Observation	ns: 📕 Good 🗌 F	N/A 🗌 Hate	ch Damaged or D)ifficult to C	pen] Wet Stru	ucture Spalling or Cracked			
	Evidence of C	oncrete Corrosio	n 🗌 Wet V	Well Needs	Cleaning - S	- Solids/Grea	ise 🗌 Other			
Hatch Field Observations:	Good T Fair: N	linor Corrosion t	o Hatches, Hinge	s, or Latche	s 🗌	Poor:Corr	oded or Broken Hatches, Hinges, or Latches			
	Other									
Wet Well Ladder Observatio	ns: Good C	Fair: Surface Co	rrosion; Steps Int	act and Soli	d; Minor Ar	ichor Bolt C	Corrosion			
	Poor: Corre	oded or Broken S	teps; Corroded o	r Broken Wa	all Anchors	Other	N/A			
Wet Well Wall Observations:	Good Fair	: Concrete Seala	nt Peeled or Crac	ked; Concre	te Soft at S	urface Pa	inted Concrete Lower Wet Well Okay			
	Poor: Exposed/	Missing Aggrega	te; Exposed/Missi	ing Re-bar	Other	Pa	inted Metal Upper Losing Paint w/Corro			
Slab/Cover Observations:	Good Fair:	Concrete or Alun	ninum Grate Sligh	ntly Corrode	d But Safe					
	Poor: Concrete Ag	gregate Missing,	/Exposed; Grate	Corroded o	r Warped; D	ebris Over	Platform Other			



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LIFT STATION CONDITION ASSESSMENT FORM									
Asset Class CMMS Code	Asset Year Present Installed	Cond. Perf. Utiliz. Rank Rank (%)	Field Observations/Comments						
Influent Pipe Observations: Good Fai	r: Slight Corrosion; Pipe Intact	Poor: Severe Pipe Corrosion	Other						
Alarm Float Observations: Good Fair: Some Grease But Operating Properly Poor: Covered in Grease or Broken Other Grease									
Pump Vent Line Observations: 📄 Good 🗌 Fair: Slight Corrosion But Operates Properly; Needs Sealant Around Opening									
Poor: Any One Vent Does Not Operate; Corroded or Broken Off at Wall 🗌 Other									
* Dry Well Image: Construction Type: None Image: Underground pump vault with access tube and ladder Located below grade inside building Lighting: Image: Yes None Yes Cathodic Protection Not Required None									
Access Tube and Ladder Field Observations:	🗌 N/A 🔳 Good 🗌 Fair: Su	rface Corrosion; Steps Intact and	Solid; Minor Anchor Bolt Corrosion						
Poor: Corroded o	or Broken Steps; Corroded or Broke	n Wall Anchors 🗌 Other							
Underground Vault Observations:	🗌 N/A 📕 Good 🗌 Fair: Su	rface Corrosion Poor: Cor	rosion Other Floor Cooroded but OK						
Building Floor Slabs: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other									
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other									
Building Walls: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other N/A									
Sump Pump: No Pes Type Field Observations: Not Operational	Model:] Poor Floor Drainage 🛛 🔳 C	Power (hp): ther OK-No Apparent Issues	TDH: Serial:						
* Cathodic Protection			Assumed Yes (not visible)						
Field Observations: Disconnected	Other								
	HVAC (HV/	A)							
* Dry Well HVAC			HTR Electrical						
Asset Size: Field Observations: Good N/A Ventilation Duct Wor	Old Ventilation Inope k Corroded Belts Loose o	r Torn Louvers	Fans Vibrate Roof Vents Other						
* Wet Well HVAC			None						
Asset Size: Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn Ventilation Duct Work Corroded Louvers Roof Vents Other									
Electrical Systems (ELE)									
* Control Panel									
Asset Size (Volts) 208 (Volts)	Single phase	Three Phase							
Manufacturer:	Model:	Serial Number:							
Power Supply Manufacturer:	Model:		Туре:						



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Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Field Observations:	Good Panel Corro Gust Inside Panel Surge Protection	ded 🗌 Old / Exposed Wires	Outdated / Obs Shop Dra Wiring Labelle	solete 🗌 wings Avail d 🗌 Pa	Contacts L able	oose UL Listed d Oth	Cables Fatigued Checked Uncovered Holes ner		
* Lighting Panel		✓							
Asset Size (Volts) Manufacturer: Interanal Model: Square D Serial Number: N/A									
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Bus and or lugs corroded Spare Spaces Available Other 									
* Main Switch		v							
Asset Size (Volts)									
Manufacturer: S	Square D	Model:		Serial Nu	nber:				
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other									
* Transfer Switch	Manual	~							
Asset Size (Volts 208 VAC 3 Phase Manufacturer: OE Model: N/A Serial Number: N/A									
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other Other								
* Motor Control C	enter N/A								
Asset Size (Volts)				<u> </u>		II			
Manufacturer:		Model:		Serial Nur	nber:				
Field Observations:	Good Panel Corror Dust Inside Panel	ded 🗌 Old / Exposed Wires	Outdated / Obso	olete 🗌 iear Worn	Contacts Lo	oose	Cables Fatigued Checked Panel Labelled		
* Junction Box									
Asset Size (Volts)	24x36x8 208 VAC	1		1		1			
Manufacturer: S	Square D	Model: Duplex		Serial Nur	nber: 5776	5			
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other								
* Miscellaneous Pa	nel 1 N/A								
Asset Size	<u>_</u>								
Manufacturer:		Model:		Serial Nu	mber:				
Field Observations:	Good Panel Corro Dust Inside Panel Panel Labelled	ded Old / Exposed Wires Other	Outdated / Obs	olete 🗌 Gear Worn	Contacts Lo	oose	Cables Fatigued Checked Panel Grounded		

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
			Generator	(GEN)				
* Emergency Generator	N/A							
* Emer. Gen. Connector		>						
Asset Size: N	lanufacturer:		Model:		Serial:		Generator Type:	
Field Observations: Go	od N/A or Accessibility	Contacts Loose Panel Grounde	Cables Fat	tigued Che Labelled	cked	Engine Fl Diesel Co	luids Low Poor Housekeeping ntainment Other	
Instrumentation (INS)								
* Auto Dialer								
Manufacturer:		Model:			Phone Nu	imber:		
Alarms: High Level	Low Level	Generator	Running 🗌 I	Power Fail	Othe	r		
* Float Controls	back up		2 float					
* Bubbler Controls								
Manufacturer:	Mercoid	1	Model: MPC	Junior		1		
* Ultrasonic Controls	Primary							
Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture Drain Condensate Traps in Air System Floats Tangled Controls Obsolete Other								
SCADA (SCA)								
Field Observations: Go	od 📕 N/A 🗌	Obsolete	Other 1400 A	Ilen Bradl	ev PLC MI	DS Radio 4	4710 SD4	
Variable Frequency Drive								
* Control Panel - VFD								
* Harmonic Filter								
* Output Filter								
Asset Size:	Manufactu	rer:	L	Model:	1		Observed RPM:	
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	aky 🗌 Other	
	1	1	Motors (N	/ITR)				
* Motor 1								
Asset Size (HP) 3								
Manufacturer: Maratho	n Electric	Model: RVE	3	9	Serial Numb	er: N/A		
Field Observations: Go	od 🗌 N/A 🗌 erheating 🗌 Ne	Makes Noise eds Lubrication	Vibrates	Shaft Sicated	Bearing No	ise 🗌 t Failing	Opposite End Bearing Noise Leaking	
Em	ergency Stop Button	in Dry Well Inope	erable 🗌 C	Other				
* Motor 2								
Asset Size (HP): ³	Manufactu	irer: Marathon	Electric	Model: Sa	ame		Serial Number: <mark>N/A</mark>	
Field Observations: GC C C C C C C C C C C C C C C C C C C	ood N/A verheating Na Na	Makes Noise eeds Lubrication i in Dry Well Inop	Vibrates	Shafi Shafi Other	Bearing No	oise	Opposite End Bearing Noise	



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
		н	or/Vert Cent	rifugal Pu	mps					
* Pump 1		✓								
Manufacturer:	Fairbanks	Mc	odel: 2016	L.		Serial Num	ber:			
Discharge Size (in) 4"	Suction	Diameter (in)		Pump Siz	TDH					
Priming Pump 📕 Ma	anufacturer:	Ν	Nodel:		Serial	No.:	Size (hp):			
Pressure Gauge 🗌 Ma	anufacturer:		Pressure Rang	ge:			PressureReading:			
Field Observations: Good Sood N/A Seals Leaking Bearing Noise Mount Failing			VibratingEvidence of	Shaft Sipe Strain	Deflection	ı 🗌 Ca her	vitating 🗌 Belts Loose			
* Pump 2	4"	*								
Discharge Size (in)	Suction [Diameter (in)		Pump Size	e (GPM)	I	TDH			
Priming Pump 📕 Ma	nufacturer:	М	odel: 2016		Serial N	No.:	Size (hp):			
Pressure Gauge 🗌 Ma	nufacturer:		Pressure Range	e:			PressureReading:			
Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other										
	Submersible Pumps (SUB)									
* Pump 1	N/A									
Manufacturer:		Moo	del:	I_	Seri	al:				
Discharge Size (in)	Suction D	ameter (in)		Pump Size	(GPM)		TDH			
Field Observations: Go	od 🗌 N/A 🗌 her	Rail System Corro	ded 🗌 Doe	es Not Seat V	Well	Cables Co	prroded or Failing			
* Pump 2	N/A									
Manufacturer:		Мос	del:	Serial:						
Discharge Size (in)	Suction D	ameter (in)		Pump Size	(GPM)		TDH			
Field Observations: Go	od 🗌 N/A 🗌 her	Rail System Corro	ded 🗌 Doe	es Not Seat V	Well	Cables Co	prroded or Failing			
			Check Valv	/es						
* Pump 1		 ✓ 								
Size (in): 4"	Manut	acturer:		Mod	lel:		Serial No:			
Field Observations: G	ood N/A heck Valve Not Seatir	Valve Operator Stung	uck 🗌 Valve Check Valve Not	e Seat Leakin : Operating	Ig	Flange	es Leaking nce of Pipe Strain			
* Pump 2										
Size (in): 4"	Manuf	acturer:		Mod	el:		Serial No:			
Field Observations: Go	od N/A , eck Valve Not Seating	Valve Operator Stu	ick 🗌 Valve Check Valve Not	Seat Leakin Operating	g	Flange	es Leaking Other			



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
		Piping and	d Valves Sucti	on Isolati	ion Valve	S				
* Pump 1	N/A									
Size (in):	Manuf	acturer:		Mc	del:		Serial No:			
Field Observations:	Good N/A Valve Operator Stuck Valve Seat Leaking Check Valve Not Seating Other						ges Leaking ence of Pipe Strain			
* Pump 2	N/A									
Size (in):	Manuf	acturer:		Mo	del:		Serial No:			
Field Observations:	Good N/A Check Valve Not Seating	Valve Operator Si	tuck 🗌 Valve Check Valve Not	e Seat Leaki : Operating	ng	Flang Flang Evide	ges Leaking ence of Pipe Strain			
	Discharge Isolation Valves									
* Pump 1	N/A									
Size (in):	Manufa	cturer:		Mo	del:		Serial No:			
Field Observations:	Good N/A N/A N Check Valve Not Seating Other	/alve Operator St	uck 🗌 Valve Check Valve Not	Seat Leakiı Operating	ng	Flange	es Leaking nce of Pipe Strain			
Size (in):	Manuf:			Mo	del·		Serial No:			
Field Observations:	Good N/A O Check Valve Not Seating Other	/alve Operator St	uck 🗌 Valve Check Valve Not	Seat Leaki Operating	ng	Flang Evide	es Leaking ence of Pipe Strain			



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LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: 499 Nelson Rd, Mosinee, WI		Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible
Engineer:	Roth Professional Solutions	Technical & Equipment Assistance: B&M Tech	rvices	
House Keep	oing: 📕 Good 🔄 N/A 🗌 Poor Lighting	Tripping Hazards Present No Fall Protection pace Heater Inoperable Potential for Shock on	on 🗌 Electrocu	Exposure to Raw Wastewater in Dry Well ition Dther

Health and Safety Issues:

Other Observations:

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments				
Site Improvement (SIM)									
* Access Driveway	X								
* Parking	X								
* Gate and Fencing				ļ					
* Site Drainage	X		ļ]	ļ					
* Grounding System	X				Grounding Rods				
* Site Lighting									
* Site Alarm Horn and Strobe Lighting	X								
General Site Electrical Observa	itions								
Access Driveway Details:	Gravel or	aggregate basec	ourse only	Conci	rete Pavement 🔳 Bituminous Pavement				
Fence Details: 🖂 Chain I	Link 🖵 Other	Fencing Height (ft):	F	encing Length (ft):				
Gate Type: 🗌 Single	Double								
Traffic: 🗌 Other	r 🗌] Site too Close	to Traffic (Jkay					
Grounding System Prese Details :	nt 🗌 Ground	ing Rings 📕 🤆	3rounding R	lods					
If applicable, approximate pa	rking area:								
If applicable, approximate sit	ie area:								
Other Notes:									
No ISO Valve due to Clo	og/Removal; Ne	ed pump tags 8	Manuals i	in Panel					
Hinge Repair need in w/	Well Hatch; Pair	nted Cabinet-O	К						



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Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
	Structure and Wetwell (PST)								
* Building	N/A								
Building Structures: N	one Concrete V	Walls 📄 Con Total Floor	ncrete Floor Area:		Plan Fl	oor Area:			
Field Observations: Go	od 🗌 N/A 🗌 R	oof Degraded	Doors and Se	curity Failir r	ng 🗌 N	leeds Paint			
* Odor Control									
Odor Details: Ve	nt Pipe	Other	Details						
Field Observations: O	perational and in use ther	On site,	but not required	Do Do	es not oper	ate, needs i	repair		
* Crane/Hoist							Portable / Off site		
Crane Details: Ma	nufacturer:		Model:		Se	rial Number	r:		
Field Observations: Go	od operating conditic	on 🗌 Does n	iot operate, requ	iires repair	Mou	nting Hard	ware intact		
* Bar Screen or Com minuter	N/A								
System Description:	No Bar Screen	Manually Raked	Bar Screen	Mechanic	cally Raked	Bar Screen	Screen Bypass Provided?		
Mechanical Bar Screens:	Manufacturer:		Model:	Seria	al Number:		Power Requirements (hp):		
Odor Details: N/A	A 🗌 Screens need	frequent cleaning	g 🗌 Shor	t repsonse t	ime	Odor fly r	nuisance 🗌 Screens not in use		
* Flow Meter	N/A								
Туре: 🗌 Ŋ	/A Type:	M	anufacturer:		Model:		Serial Number:		
Flow Meter Field Observat	tions: 🗌 Operation	al			ocation				
	Other								
* Wet Well		✓							
Walls: 📕 Concr	ete 🗌 Steel	Fiberglass							
Slab/Cover: 📕 Reinfo	orced Concrete	Steel Pur	mps, motors and	d electric p	anel are n	nounted or	n cover/slab directly over wet well		
Pump Control System: 📕	Floats Bubble	er System	Ultrasonic & Tra	nsducer					
Measurement (PPM):									
Wet Well Field Observatio	ns: 📕 Good 🗌	PN/A 🗌 Hato	ch Damaged or D	oifficult to O	pen	Wet Stru	ucture Spalling or Cracked		
Evidence of Concrete Corrosion Wet Well Needs Cleaning - Solids/Grease Other									
Hatch Field Observations:	Good Fair: N	Ainor Corrosion t	o Hatches, Hinge	s, or Latche	s	Poor:Corr	oded or Broken Hatches, Hinges, or Latches		
Other New Hinge on Access Hatch									
Wet Well Ladder Observations: Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion Poor: Corroded or Broken Steps; Corroded or Broken Wall Anchors Other N/A									
Wet Well Wall Observations:	🔲 Good 🗔 Fai	r: Concrete Seala	nt Peeled or Crac	ked: Concre	te Soft at S	urface			
	Poor: Exposed,	/Missing Aggregat	te; Exposed/Miss	ing Re-bar	Other				
Slab/Cover Observations:	Good Eair:	Concrete or Alum	ninum Grate Sligh	ntly Corrode	d But Safe				
[Poor: Concrete Ag	gregate Missing,	Exposed; Grate	Corroded o	r Warped; D	ebris Over	Platform Other		



Roth Professional Solutions

Section	З.	ItemD
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LIFT STATION CONDITION ASSESSMENT FORM							
Asset Class CMMS Co	de Asset Year Present Installed	Cond. Perf. Rank Rank	Utiliz. Field Observations/Comments (%)				
Influent Pipe Observations: Good	Fair: Slight Corrosion; Pipe Intact	Poor: Severe Pipe Corr	rosion 🗌 Other				
Alarm Float Observations: Good	Fair: Some Grease But Operating Pro	operly Poor: C	overed in Grease or Broken 🗌 Other				
Pump Vent Line Observations: Good	Fair: Slight Corrosion But Operates P ny One Vent Does Not Operate; Corroded	roperly; Needs Sealant d or Broken Off at Wal	Around Opening				
* Dry Well			Valve Vault				
Location Type: None Lighting: Yes Lighting: Yes Cathodic Protection Not Require	Underground pump vault with access t No red None Yes	tube and ladder	Located below grade inside building				
Access Tube and Ladder Field Observations:	N/A Good Fair: Surfa	ice Corrosion; Steps Int Wall Anchors 🗌 Otł	act and Solid; Minor Anchor Bolt Corrosion				
Underground Vault Observations:	🗌 N/A 📕 Good 🗌 Fair: Surfa	ace Corrosion	Poor: Corrosion 🗌 Other				
Building Floor Slabs: N/A Good	Building Floor Slabs: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other						
Staircases/Stairwells: N/A Go	Dod Fair: Concrete Cracked; Concret 2d/Missing Aggregate; Exposed/Missing Re	e Soft at Surface					
Building Walls: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other							
Sump Pump: No Yes Type Field Observations: Not Operational	Model:	Power (hp): er <mark>N/A</mark>	TDH: Serial:				
* Cathodic Protection N/A							
Field Observations: Disconnected	Other	I					
	HVAC (HVA)						
* Dry Well HVAC N/A							
Asset Size: Field Observations: Good N/A	Old Ventilation Inopera	ble 🗌 Makes N Forn 📄 Louve	oise 🗌 Fans Vibrate rs 🔲 Roof Vents 🔲 Other				
* Wet Well HVAC N/A							
Asset Size: Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn Ventilation Duct Work Corroded Louvers Roof Vents Other							
Electrical Systems (ELE)							
* Control Panel			Need Pump Tags & Manuals in Panel				
Asset Size (Volts) 208 VAC	Single phase	Three Phase					
Manufacturer: Hoffman	Model: Type 3R	Serial Number:					
Power Supply Manufacturer:	Model:		Type: 48"x36"x12" Painted				



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Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments
Field Observations:	Good Panel Corro Dust Inside Panel	oded Old / Exposed Wires Grounded C	Outdated / Obs	solete 🗌 awings Avail d 🗌 Pa	Contacts I able	oose UL Listed	Cables Fatigued Checked Uncovered Holes her Pump Tags
* Lighting Panel	N/A						
Asset Size (Volts) Manufacturer:		Model:		Serial Nur	nber:		
Field Observations:	Good Panel Corro	ded Old / Exposed Wires Panel Grounded	Outdated / Obsc	olete	Contacts Lo	oose	Cables Fatigued Checked orroded Spare Spaces Available
* Main Switch		✓					
Asset Size (Volts) 20	08 VAC	11				I	1
Manufacturer: (GE	Model: TEB 13	321	Serial Nur	nber:		
Field Observations:	Good Panel Corro	oded 🗌 Old / Exposed Wires Other	Outdated / Obs	olete 🗌 Gear Worn	Contacts L	oose	Cables Fatigued Checked Panel Grounded
* Transfer Switch		 ✓ 					Manual Portable Generator
Asset Size (Volts	Manual Portable Genera						
Manufacturer:		Model:		Serial Nu	mber:		
Field Observations:	Good Panel Corre Dust Inside Panel Panel Panel Labelled	oded 🗌 Old / Exposed Wires Other	Outdated / Obs	olete	Contacts L	.oose	Cables Fatigued Checked Panel Grounded
* Motor Control C	enter N/A						
Asset Size (Volts)							
Manufacturer:		Model:		Serial Nur	nber:		
Field Observations:	Good Panel Corro Dust Inside Panel Other	ded Old / Exposed Wires	Outdated / Obso	olete 🗌 iear Worn	Contacts Lo	oose 🗌 Corroded [Cables Fatigued Checked Panel Labelled
* Junction Box		✓					
Asset Size (Volts)	48x36x12 Mounted	I					
Manufacturer:	Hoffman	Model: Type 3	R	Serial Nur	nber:		
Field Observations:	Good Panel Corro	ded Old / Exposed Wires Other	Outdated / Obso	olete 🗌 iear Worn	Contacts Lo	oose Corroded [Cables Fatigued Checked Panel Grounded
* Miscellaneous Pa	nel 1	✓					Replace Back-up Controllers; 1-2x a yr; 11 STA
Asset Size							
Manufacturer:		Model:		Serial Nu	mber:		
Field Observations:	Good Panel Corro	oded Old / Exposed Wires Other Motor	Outdated / Obs	olete Gear Worn ced 2020	Contacts L	oose 🗌 Corroded	Cables Fatigued Checked Panel Grounded



Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Generator (GEN)									
* Emergency Generator									
* Emer. Gen. Connector									
Asset Size: N	lanufacturer:		Model:		Serial:		Generator Type:		
Field Observations: Go	ood N/A or Accessibility	Contacts Loose] Panel Groundee	Cables Fat	tigued Che Labelled	cked	Engine Fl Diesel Co	uids Low Door Housekeeping		
Instrumentation (INS)									
* Auto Dialer		✓							
Manufacturer: Sensa	aPhone	Model: 8	00		Phone Nu	mber: 715	-693-7721		
Alarms: High Leve	I Low Level	Generator	Running 🗌 I	Power Fail	Othe	r			
* Float Controls	2 Float	✓	Back up						
* Bubbler Controls									
Manufacturer:			Model:			I	1		
* Submersible Level Controls	;	 ✓ 					0-5 PSI		
Field Observations: Good Field Observations:	Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture Drain Condensate Traps in Air System Floats Tangled Controls Obsolete Other								
			SCADA	(SCA)					
Field Observations: Go	od 📕 N/A 🗌	Obsolete	Other						
Variable Frequency Drive									
* Control Panel - VFD	N/A								
* Harmonic Filter	N/A								
* Output Filter	N/A								
Asset Size:	Manufactu	irer:		Model:			Observed RPM:		
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	ıky 🗌 Other		
	1		Motors (N	/ITR)	1				
* Motor 1		✓							
Asset Size (HP) 10									
Manufacturer: Shinmay	ywa Pumps	Model: 4CN	1X	5	Serial Numb	er:			
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other									
* Motor 2		✓							
Asset Size (HP): 10	Manufactu	irer: Shinmayw	a	Model: 40	NX		Serial Number:		
Field Observations: Gr Co Er	Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other								



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Hor/Vert Centrifugal Pumps								
* Pump 1	N/A							
Manufacture	er:	M	odel:			Serial Num	ber:	
Discharge Size (in)	Suction	Diameter (in)		Pump Siz	e (GPM)		TDH	
Priming Pump	Manufacturer:	ſ	Model:		Serial	No.:	Size (hp):	
Pressure Gauge	Manufacturer:		Pressure Rang	ge:			PressureReading:	
Field Observations:	Good N/A Bearing Noise N	Seals Leaking Aount Failing	VibratingEvidence of	Shaft Sipe Strain	Deflection	her	vitating 🗌 Belts Loose	
* Pump 2	N/A							
Discharge Size (in)	Suction D	iameter (in)		Pump Size	e (GPM)		TDH	
Priming Pump 📃 🛛 N	/lanufacturer:	N	1odel:		Serial N	No.:	Size (hp):	
Pressure Gauge N	Nanufacturer:		Pressure Range	e:			PressureReading:	
Field Observations:	Good N/A Bearing Noise M	Seals Leaking	VibratingEvidence of F	Shaft Shaft	Deflection	Cavi	itating 🗌 Belts Loose	
		Su	bmersible Pu	mps (SUB)				
* Pump 1		~						
Manufacturer:	Shinmaywa	Мо	del: 4CNX		Seria	al:		
Discharge Size (in) 4"	Suction Di	ameter (in)		Pump Size	(GPM) 17	5	TDH 10 HP	
Field Observations:	Good N/A O	Rail System Corro	oded 🗌 Doe 20	es Not Seat V	Well	Cables Co	rroded or Failing	
* Pump 2		✓						
Manufacturer:	Shinmaywa	Мо	del: 4CNX		Seria	al:		
Discharge Size (in) 4"	Suction Di	ameter (in)		Pump Size	(GPM)		TDH	
Field Observations:	Good N/A Other Seal Fail / Rela	Rail System Corro	oded Doe	es Not Seat V	Well	Cables Co	rroded or Failing	
			Спеск vai	/es				
* Pump 1 Size (in): 4"	Manuf	acturer:		Moc	lel:		Serial No:	
Field Observations:	Good N/A Check Valve Not Seatin Other	/alve Operator St	uck 🗌 Valve Check Valve Not	e Seat Leakir Operating	g	Flange	es Leaking Ince of Pipe Strain	
* Pump 2		✓						
Size (in): 4"	Manufa	acturer:		Mod	el:		Serial No:	
Field Observations:	Good N/A N/A N Check Valve Not Seating	/alve Operator Sto	uck 🗌 Valve Check Valve Not	Seat Leakin Operating	g	Flange	s Leaking 🗌 Other ce of Pipe Strain	



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LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Present	Year	Cond. Rank	Perf. Bank	Utiliz. _(%)	Field Observations/Comments
		Piping and	Valves Suction	on Isolati	on Valve	s	
* Pump 1	N/A						
Size (in):	Manuf	acturer:		Мо	del:		Serial No:
Field Observations:	Good N/A C	Valve Operator Stu	uck 🗌 Valve Check Valve Not	e Seat Leaki : Operating	ng	Flang	es Leaking ence of Pipe Strain
* Pump 2	N/A						
Size (in):	Manuf	acturer:		Мо	del:		Serial No:
Field Observations:	Good N/A C	Valve Operator Stu g 🛛 🗍 (uck 🗌 Valve Check Valve Not	e Seat Leaki : Operating	ng	Flang	ges Leaking ence of Pipe Strain
		Discha	arge Isolation	Valves			
* Pump 1		~					ISO Valve Removed Due to Clogging
Size (in):	Manufa	octurer:		Мос	del:		Serial No:
Field Observations:	Good N/A N/A Check Valve Not Seating	/alve Operator Stu	ck 🗌 Valve Check Valve Not	Seat Leakir Operating	ng	Flange	es Leaking nce of Pipe Strain
Size (in):	Manufa	acturer:		Mo	del:		Serial No:
Field Observations:	Good N/A N Check Valve Not Seating Other	/alve Operator Stu	ick 🗌 Valve Check Valve Not	Seat Leakii Operating	ng	Evide	es Leaking nce of Pipe Strain

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LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location:	1100 Cedar Rd	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible
Engineer:	Roth Professional Solutions	Technical & Equipment Assistance: B&M Tech	nnical Se	Services
House Kee	eping: 📕 Good 🗌 N/A 🗌 Poor Lighting	Tripping Hazards Present No Fall Protection Space Heater Inoperable Potential for Shock on	on 🗌 Electrocu	Exposure to Raw Wastewater in Dry Well ition Dther

Health and Safety Issues:

Other Observations: Painted Cabinet, has been replaced

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments						
Site Improvement (SIM)											
* Access Driveway	X										
* Parking	X				One driveway						
* Gate and Fencing					N/A						
* Site Drainage	X			ļ	Okay						
* Grounding System	X										
* Site Lighting					N/A						
* Site Alarm Horn and Strobe Lighting	X										
General Site Electrical Observa	itions										
Access Driveway Details: Parking Details: None Parking Details: None Fence Details: Chain Gate Type: Single Traffic: Othe Grounding Prese Details : If applicable, approximate particular to black	Access Driveway Details: Gravel Gravel Paved Fence Details: Chain Link Other Fencing Height (ft): Fencing Length (ft): Gravel Double N/A Traffic: Other Site too Close to Traffic Grounding Pystem Present Grounding Rods Present Grounding Rods Present in the anti-instance anti-i										
If applicable, approximate sit	ie area:										
Other Notes:											
Submersible, 10HP, 30A	\mp, 2018, 30, I	3arnes 1999									



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Section 3, ItemD.

		Present	Installed	Rank	Rank	(%)	Field Observations/Comments			
Structure and Wetwell (PST)										
* Building	N/A									
Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:										
Field Observations: Good N/A Roof Degraded Doors and Security Failing Needs Paint Cracks on the Wall Cracks on the Floor Other										
* Odor Control		✓					Okay			
Odor Details: Ver	Odor Details: Vent Pipe Other Details									
Field Observations: Operational and in use On site, but not required Does not operate, needs repair										
* Crane/Hoist		✓					Portable Offsite			
Crane Details: Mar	nufacturer:		Model:		Ser	rial Number	c.			
Field Observations: Go	od operating conditio	n 🗌 Does n	ot operate, requ	ires repair	☐ Mou	nting Hard	ware intact			
	ner					Ū				
* Bar Screen or Com minuter	N/A									
System Description:	No Bar Screen	Manually Raked I	Bar Screen	Mechanio	ally Raked	Bar Screen	Screen Bypass Provided?			
Mechanical Bar Screens:										
Odor Details: 🗌 N/A	Screens need	frequent cleaning	g 🗌 Shor	t repsonse t	ime	Odor fly n	nuisance 🗌 Screens not in use			
Oth	er			1						
* Flow Meter	N/A									
Type: 🗌 N/	А Туре:	Ma	anufacturer:		Model:		Serial Number:			
Flow Meter Field Observat	ions: 🗌 Operationa	al		L	ocation					
	Other									
* Wet Well		✓					6' Dia; 150 valve okay; 10GPM +/- Field Comp Pumping			
Walls: 📕 Concre	ete 🗌 Steel [Fiberglass								
Slab/Cover: 📕 Reinfo	rced Concrete	Steel Pur	nps, motors and	d electric p	anel are m	nounted or	n cover/slab directly over wet well			
Pump Control System: 📕	Floats 🗌 Bubble	r System	Ultrasonic & Tar	sducer						
Measurement (PPM):										
Wet Well Field Observation	ns: 📕 Good 🗌 🖡	PN/A 🗌 Hato	h Damaged or D	oifficult to C	pen] Wet Stru	icture Spalling or Cracked			
	Evidence of C	oncrete Corrosio	n 🗌 Wet V	Well Needs	Cleaning - S	olids/Grea	se 🗌 Other			
Hatch Field Observations:	Good 🗌 Fair: N	linor Corrosion to	o Hatches, Hinge	s, or Latche	s 📕	Poor:Corr	oded or Broken Hatches, Hinges, or Latches			
Other										
Wet Well Ladder Observation	Wet Well Ladder Observations: Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion Poor: Corroded or Broken Steps; Corroded or Broken Wall Anchors Other N/A									
Wet Well Wall Observations:	Good Fair	: Concrete Sealar Missing Aggregat	nt Peeled or Crac e; Exposed/Missi	ked; Concre ing Re-bar	te Soft at Su	urface				
Slab/Cover Observations:	Good Fair: Poor: Concrete Ag	Concrete or Alum gregate Missing/	iinum Grate Sligh Exposed; Grate	itly Corrode Corroded o	d But Safe [.] Warped; D	ebris Over	Surface Valve Port Covered by LS Platform Other Panel			



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Section	3	ItemD
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LIFT STATION CONDITION ASSESSMENT FORM									
Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Obse	ervations/Comments	
Influent Pipe Observations:	Good Fair:	Slight Corrosion;	Pipe Intact	Poor: Se	/ere Pipe Co	prrosion	Other		
Alarm Float Observations:	Good 📕 F	air: Some Grease	e But Operating P	roperly	Poor:	Covered in	Grease or Broken	Other Grease	
Pump Vent Line Observations: Good Fair: Slight Corrosion But Operates Properly; Needs Sealant Around Opening Poor: Any One Vent Does Not Operate; Corroded or Broken Off at Wall Other									
* Dry Well		✓					Valve Vault		
Location Type: None Underground pump vault with access tube and ladder Lighting: Yes No Cathodic Protection Not Required None Yes									
Access Tube and Ladder Field	Observations:	N/A Goc	od Eair: Sur	face Corros	ion; Steps I	ntact and So	olid; Minor Anchor	Bolt Corrosion	
Underground Vault Observativ	ons:	N/A ∎ Gor	od \square Fair: Sur	face Corros	sion	Poor: Corr	rosion 🗌 Other		
Building Floor Slabs: N,	Building Floor Slabs: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other								
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other N/A									
Building Walls:	Building Walls: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other								
Sump Pump: No Ye	s Type t Operational	Model: Poor Floor Drair	nage 🗌 O ^r	Power (h ther	p):	1	TDH:	Serial:	
* Cathodic Protection	N/A								
Field Observations:	sconnected C	<i>i</i> ther							
			HVAC (HVA	()					
* Dry Well HVAC	N/A						<u> </u>		
Asset size: Field Observations: Go	od N/A] Old 🗌 \ Corroded [√entilation Inoper	rable [r Torn	Makes	Noise	_ Fans Vibrate Roof Vents	Other	
* Wet Well HVAC	N/A								
Asset Size: Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn Ventilation Duct Work Corroded Louvers Roof Vents Other									
Electrical Systems (ELE)									
* Control Panel		~					100 AMP		
Asset Size (Volts) 208 (VA Manufacturer: Power Supply Manufactu	C)	Single Model:	phase	Three Pha Serial Nu	ise mber:		Τνρε:		
· • • • • • • • • • • • • • • • • • • •			ineac.				1}200		



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Section 3, ItemD.

Asset Class	CMMS Code Asset Year Cond. Perf. Utiliz. Field Observations/Comments Present Installed Rank Rank (%)							
Field Observations:	 Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Shop Drawings Available UL Listed Uncovered Holes Surge Protection Grounded Wiring Labelled Panel Labelled Other 							
* Lighting Panel	N/A							
Asset Size (Volts)								
Manufacturer:	Model: Serial Number:							
ield Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Bus and.or lugs corroded Spare Spaces Available Breakers Labelled Panel Grounded Panel Labelled Other								
* Main Switch								
Asset Size (Volts) 20	N8 VAC							
Manufacturer: (GE Model: ^{10HP} Serial Number: ^{500224-F}							
Field Observations:	 Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other 							
* Transfer Switch	Manual 🖌							
Asset Size (Volts								
Manufacturer:	Model: ³¹ Serial Number: ^{50002214-F}							
Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other							
* Motor Control C	Center N/A							
Asset Size (Volts)								
Manufacturer:	Model: Serial Number:							
Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other							
* Junction Box	N/A							
Asset Size (Volts)								
Manufacturer:	Model: Serial Number:							
Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Other Other							
* Miscellaneous Pa	nel 1 N/A							
Asset Size								
Manufacturer:	Model: Serial Number:							
Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other							

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Generator (GEN)										
* Emergency Generator										
* Emer. Gen. Connector		>					Manual Hook-up			
Asset Size: 10 HP N	lanufacturer:		Model:		Serial:		Generator Type:			
Field Observations: 📕 Go	Field Observations: Good N/A Contacts Loose Cables Fatigued Checked Engine Fluids Low Poor Housekeeping Poor Accessibility Panel Grounded Panel Labelled Diesel Containment Other Other									
Instrumentation (INS)										
* Auto Dialer		✓					Sensaphone 400			
Manufacturer:		Model:			Phone Nu	umber:				
Alarms: 📕 High Leve	l 📕 Low Level	Generator	Running 📕 I	Power Fail	Othe	r				
* Float Controls		✓								
* Bubbler Controls										
Manufacturer:		1	Model:							
* Ultrasonic Controls							Transducer 0-5 PSI Recent Adjustment			
Field Observations: 📕 Goo	Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture									
Dra	in Condensate Traps	in Air System	Floats Tan	gled	Controls C	Obsolete	Other			
			SCADA	(SCA)						
Field Observations: Go	od 🔳 N/A 🗌	Obsolete	Other							
Variable Frequency Drive										
* Control Panel - VFD	N/A									
* Harmonic Filter	N/A									
* Output Filter	N/A									
Asset Size:	Manufactu	rer:		Model:			Observed RPM:			
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	aky 🗌 Other			
	I		Motors (N	/ITR)						
* Motor 1		✓								
Asset Size (HP) 10										
Manufacturer: Barnes		Model:		9	Serial Numb	er:				
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other										
* Motor 2		✓								
Asset Size (HP): 10	Manufactu	irer: Barnes		Model:			Serial Number:			
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other										



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Hor/Vert Centrifugal Pumps										
* Pump 1		✓								
Manufacturer:	Barnes	Мос	del:			Serial Num	ber:			
Discharge Size (in) 6"	Suction [Diameter (in)		Pump Siz	e (GPM)		TDH			
Priming Pump 🗌 Mai	nufacturer:	М	odel:		Serial	No.:	Size (hp):			
Pressure Gauge 🗌 Mar	nufacturer:		Pressure Rang	ge:			PressureReading:			
Field Observations: 📕 G	ood 🗌 N/A 🗌 earing Noise 🗌 N	Seals Leaking	VibratingEvidence of	Shaft Sipe Strain	Deflection	Ca	vitating 🗌 Belts Loose			
* Pump 2		~								
Discharge Size (in) 6"	Suction D	iameter (in)		Pump Size	e (GPM) 21	0	TDH			
Priming Pump Man	ufacturer:	Mc	odel:		Serial N	lo.:	Size (hp):			
Pressure Gauge 🗌 Man	ufacturer:		Pressure Range	9:			PressureReading:			
Field Observations: 📕 Go	od 🗌 N/A 🗌 aring Noise 🗌 M	Seals Leaking [ount Failing [Vibrating Evidence of P	Shaft Sipe Strain	Deflection	Cav	itating Belts Loose			
		Sub	mersible Pur	nps (SUB))					
* Pump 1		~								
Manufacturer: B	arnes	Mod	el:	I	Seria	al:				
Discharge Size (in) 6"	Suction Dia	ameter (in)		Pump Size	(GPM) 21	0	TDH			
Field Observations: 📕 Goo	od 🗌 N/A 🗌 i er	Rail System Corroo	led 🗌 Doe	s Not Seat	Well	Cables Co	prroded or Failing			
* Pump 2		✓								
Manufacturer: Ba	arnes	Mod	el:	L	Seria	al:				
Discharge Size (in) 6"	Suction Dia	ameter (in)		Pump Size	(GPM) 21	0	TDH			
Field Observations: 📕 Goc	od 🗌 N/A 🗌 i er	Rail System Corroc	led 🗌 Doe	s Not Seat V	Well	Cables Co	prroded or Failing			
			Check Valv	ves						
* Pump 1		✓								
Size (in): <mark>6</mark> "	Manufa	acturer:		Mod	lel:		Serial No:			
Field Observations: Good N/A Valve Operator Stuck Valve Seat Leaking Check Valve Not Seating Check Valve Not Seating Other Flanges Leaking Evidence of Pipe Strain Other						es Leaking nce of Pipe Strain				
* Pump 2		✓								
Size (in): <mark>6</mark> "	Manufa	cturer:		Mod	el:		Serial No:			
Field Observations: Goo	d N/A _V ck Valve Not Seating	alve Operator Stud	k 🗌 Valve heck Valve Not	Seat Leakin Operating	g	Flange	es Leaking Other			



LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Year Present Installed	Cond. Perf. Rank Rank	. Utiliz. < (%)	Field Observations/Comments
		Piping and Valves Suc	tion Isolation Val	ves	
* Pump 1		 ✓ 			
Size (in): <mark>6</mark> "	Manuf	acturer:	Model:		Serial No:
Field Observations:	Good N/A C Check Valve Not Seatin	Valve Operator Stuck 🗌 Val g 🗌 Check Valve N	ve Seat Leaking ot Operating	Flanges Le	eaking of Pipe Strain
* Pump 2		 ✓ 			
Size (in): <mark>6</mark> "	Manuf	acturer:	Model:		Serial No:
Field Observations:	Good N/A Check Valve Not Seatin	Valve Operator Stuck 🗌 Val g 🗌 Check Valve N	ve Seat Leaking ot Operating	Flanges Le	eaking of Pipe Strain
		Discharge Isolatic	on Valves		
* Pump 1		 Image: A start of the start of			
Size (in): <mark>6</mark> "	Manufa	acturer:	Model:	L	Serial No:
Field Observations:	Good N/A C	/alve Operator Stuck 🗌 Valv Check Valve No	ve Seat Leaking ot Operating	Flanges Le	aking of Pipe Strain
* Pump 2	N/A				
Size (in):	Manuf	acturer:	Model:		Serial No:
Field Observations:	Good N/A C Check Valve Not Seating Other	Valve Operator Stuck Valv g Check Valve N	ve Seat Leaking ot Operating	Flanges Le	eaking of Pipe Strain

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LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: 21	100 River Forest Ln	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible
Engineer:	Roth Professional Solutions	Technical & Equipment Assistance: B&M Tec	nnical Se	rvices
House Keep	ing: Good N/A Poor Lighting Sump Pump Inoperable Electric S	Tripping Hazards Present No Fall Protection pace Heater Inoperable Potential for Shock on	on 🗌 Electrocu	Exposure to Raw Wastewater in Dry Well ition 🗌 Other

Health and Safety Issues:

Other Observations: 15 HP Barnes Ea / Add-A-Phase Power System (3 Phase Converter System)

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments						
Site Improvement (SIM)											
* Access Driveway	X										
		ļļ	ļ	 							
* Parking	X	<u> </u>									
* Gate and Fencing											
* Site Drainage	X	<u> </u>		 							
* Grounding System	X			 							
* Site Lighting											
* Site Alarm Horn and Strobe Lighting	X										
General Site Electrical Observa	General Site Electrical Observations										
Access Driveway Details:	Gravel or	r aggregate basec	course only	Concr	rete Pavement 🗌 Bituminous Pavement						
Parking Details: None	Gravel	Pavec	d								
Fence Details: 🗌 Chain	Link 🗌 Other	Fencing Height ((ft):	F	encing Length (ft):						
Gate Type: 🗌 Single	Double	N/A									
Traffic: Othe	r 🗌] Site too Close f	to Traffic								
Grounding System Prese Details :	nt 🗌 Ground	ling Rings 🗌 🤆	Grounding R	lods							
If applicable, approximate pa	rking area:										
If applicable, approximate sit	ie area:										
Other Notes:											
Panel Labeling Not Curr	ent; 3" Influent	FM, Turned Dov	wn, is Shov	wing Corro	osion						
Pump 2 Replaced 2018;	Pump 1 Origina	al 1999									



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Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Structure and Wetwell (PST)										
* Building		✓					Duplex Submersible			
Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:										
Field Observations: Good N/A Roof Degraded Doors and Security Failing Needs Paint Cracks on the Wall Cracks on the Floor Other										
* Odor Control		✓								
Odor Details: Ver	nt Pipe	Other	Details							
Field Observations:	Field Observations: Operational and in use On site, but not required Does not operate, needs repair									
* Crane/Hoist		✓					Portable / Off Site			
Crane Details: Mar	nufacturer:		Model:		Sei	rial Number	r:			
Field Observations:	od operating conditio	on 🗌 Does n	iot operate, requ	ires repair	🗍 Mou	nting Hard	ware intact			
	ner					U				
* Bar Screen or Com minuter	N/A									
System Description:	No Bar Screen	Manually Raked	Bar Screen	Mechanic	ally Raked	Bar Screen	Screen Bypass Provided?			
Mechanical Bar Screens:	Manufacturer:		Model:	Seria	al Number:		Power Requirements (hp):			
Odor Details: N/A	Screens need	frequent cleaning	g 🗌 Shor	t repsonse t	ime	Odor fly r	nuisance 🗌 Screens not in use			
* Flow Meter	N/A									
Type: 🗌 N/	′А Туре:	M	anufacturer:		Model:		Serial Number:			
Flow Meter Field Observat	ions: 🗌 Operationa	al			ocation					
	Other									
* Wet Well		✓								
Walls: 📕 Concre	ete 🗌 Steel	Fiberglass								
Slab/Cover: 📕 Reinfo	orced Concrete	Steel Pur	mps, motors and	d electric p	anel are m	nounted or	n cover/slab directly over wet well			
Pump Control System: 📕	Floats 🗌 Bubble	r System	Ultrasonic 2 F	loat High/L	.ow w/ Tra	nsducer				
Measurement (PPM): 0-5	PSI MPC 0-5 PSI									
Wet Well Field Observation	ns: 📕 Good 🗌 🗌	PN/A 🗌 Hato	ch Damaged or D	Difficult to O	pen] Wet Stru	ucture Spalling or Cracked			
	Evidence of C	oncrete Corrosio	n 🗌 Wet V	Well Needs	Cleaning - S	olids/Grea	ise Other			
Hatch Field Observations:	Good 🗌 Fair: N	linor Corrosion to	o Hatches, Hinge	es, or Latche	s	Poor:Corr	oded or Broken Hatches, Hinges, or Latches			
[Other									
Wet Well Ladder Observation	is: Good Poor: Corr	Fair: Surface Cor oded or Broken S	rrosion; Steps Int teps; Corroded o	act and Solio r Broken Wa	d; Minor An all Anchors [chor Bolt C	Corrosion			
Wet Well Wall Observations:	Good 🗔 Fair	r: Concrete Sealar	nt Peeled or Crac	ked: Concre	te Soft at S	urface				
	Poor: Exposed,	/Missing Aggregat	te; Exposed/Missi	ing Re-bar	Other					
Slab/Cover Observations:	Good Eair:	Concrete or Alum	ninum Grate Sligh	ntly Corrode	d But Safe					
Poor: Concrete Aggregate Missing/Exposed; Grate Corroded or Warped; Debris Over Platform Other										



Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM				
Asset Class CM	MS Code Asset Present	Year Cond Installed Rank	. Perf. Utiliz Rank (%)	· Field Observations/Comments
Influent Pipe Observations: 🔳 Good 🗌 Fair: Slight Corrosion; Pipe Intact 📄 Poor: Severe Pipe Corrosion 🔳 Other 3" Influent DI Low Pressure FM				
Alarm Float Observations: Good Fair: Some Grease But Operating Properly Poor: Covered in Grease or Broken Other				
Pump Vent Line Observations: 🔄 Good 📄 Fair: Slight Corrosion But Operates Properly; Needs Sealant Around Opening				
Poor: Any One Vent Does Not Operate; Corroded or Broken Off at Wall Other				
* Dry Well	~			Valve Vault Drain Clogged
Location Type: None Underground pump vault with access tube and ladder				
Lighting: Yes No				
Access Tube and Ladder Field Observations: N/A Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion				
Underground Vault Observations				
Building Floor Slabs: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface				
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other				
Building Walls: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface				
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other				
Sump Pump: No Yes Type Model: Power (hp): TDH: Serial:				
Field Observations: Not Operational Poor Floor Drainage Other				
* Cathodic Protection N/A				
Field Observations: Disconnected Other				
HVAC (HVA)				
* Dry Well HVAC N/A				
Asset Size:				
Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Ventilation Duct Work Corroded Belts Loose or Torn Louvers Roof Vents Other				
* Wet Well HVAC N/A				
Asset Size:				
Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn				
Ventilation Duct Work Corroded Louvers Roof Vents Other				
Electrical Systems (ELE)				
* Control Panel	~			Max 30 HP
Asset Size (Volts) 240/10ln, 208/30) Out Single	e phase Three F	hase Add-A-Pha	se Converter
Manufacturer:	Model:	Serial N		
Power Supply Manufacturer:		Model:		Type: ADDA PHASE UNIT RONK


RPS ROTH PROFESSIONAL SOLUTIONS Roth Professional Solutions

Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments
Field Observations:	Good Panel Corroc Dust Inside Panel Surge Protection	ed Old / G Exposed Wires Grounded O	Dutdated / Obs	olete 🗌 wings Availa d 🗌 Pa	Contacts L able nel Labelle	oose UL Listed ed D Oth	Cables Fatigued Checked Uncovered Holes ner
* Lighting Panel							
Asset Size (Volts)							
Manufacturer:		Model:		Serial Num	nber:		
Field Observations:	Good Panel Corrod Dust Inside Panel Breakers Labelled	ed 🗌 Old / O Exposed Wires Panel Grounded	utdated / Obso	lete 🗌 (ear Worn [abelled 🗌	Contacts Lo Bus ar Other	oose	Cables Fatigued Checked orroded Spare Spaces Available
* Main Switch		✓					
Asset Size (Volts) 20	08 3 Phase						
Manufacturer:	Hoffman	Model: 96		Serial Num	nber:		
Field Observations:	Good Panel Corroc Dust Inside Panel Panel Labelled	ed Old / C Exposed Wires Other Phase Cor	Outdated / Obso Switch G Nerter Ineffici	olete 🗌 iear Worn ent	Contacts L	oose Corroded [Cables Fatigued Checked Panel Grounded
* Transfer Switch		✓					Manual
Asset Size (Volts	30 HP						1
Manufacturer:	SMEDE Breaker	Model:		Serial Nun	nber:		
Field Observations: * Motor Control (Good Panel Corror Dust Inside Panel Panel Labelled Center N/A	led Old / C Exposed Wires Other	Outdated / Obso	olete	Contacts L	oose	Cables Fatigued Checked Panel Grounded
Asset Size (Volts)		L.		L 1		J	
Manufacturer:		Model:		Serial Num	ber:		
Field Observations:	Good Panel Corrod Dust Inside Panel Other	ed 🗌 Old / O Exposed Wires	utdated / Obsc	olete 🗌 (ear Worn [Contacts Lo	oose	Cables Fatigued Checked Panel Labelled
* Junction Box		✓					
Asset Size (Volts)	208 3 Phase	l		I			
Manufacturer:	Hoffman	Model: 96		Serial Num	ber:		
Field Observations:	Good Panel Corrod	ed Old / O Exposed Wires Other Phase Co	utdated / Obsc	olete 🗌 (ear Worn [ient	Contacts Lo	oose	Cables Fatigued Checked Panel Grounded
* Miscellaneous Pa	anel 1 N/A						
Asset Size							
Manufacturer:		Model:		Serial Num	nber:		
Field Observations:	Good Panel Corroc Dust Inside Panel Panel Labelled	led Old / C Exposed Wires Other	Outdated / Obso	olete 🗌 Gear Worn	Contacts L	oose Corroded [Cables Fatigued Checked Panel Grounded

Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Generator (GEN)									
* Emergency Generator									
* Emer. Gen. Connector		✓					Portable Off-Site		
Asset Size: 30 HP N	1anufacturer: SMED	E Breaker	Model:		Serial:		Generator Type:		
Field Observations: 📕 Go	Field Observations: Good N/A Contacts Loose Cables Fatigued Checked Engine Fluids Low Poor Housekeeping Diesel Containment Other Other								
Instrumentation (INS)									
* Auto Dialer		✓							
Manufacturer: Sensa	aphone	Model: 9	6		Phone Nu	umber:			
Alarms: 📕 High Leve	l 📕 Low Level	Generator	Running 📕 I	Power Fail	Othe	r			
* Float Controls	back up		2 float						
* Bubbler Controls	primary						0-5 PSI		
Manufacturer:	Mercoid	1	Model:	1					
* Ultrasonic Controls									
Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture Drain Condensate Trans in Air System Floats Tangled Controls Obsolete Other									
			SCADA	(SCA)					
Field Observations: Go	od 🗌 N/A 🗌	Obsolete	Other						
Variable Frequency Drive									
* Control Panel - VFD	N/A								
* Harmonic Filter	N/A								
* Output Filter	N/A								
Asset Size:	Manufactu	irer:		Model:			Observed RPM:		
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	aky 🗌 Other		
Motors (MTR)									
* Motor 1	N/A								
Asset Size (HP)									
Manufacturer:		Model:		9	Serial Numb	er:			
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other									
* Motor 2	N/A								
Asset Size (HP):	Manufactu	irer:		Model:		1	Serial Number:		
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other									



Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Hor/Vert Centrifugal Pumps								
* Pump 1	N/A							
Manufacturer:		Mo	del:			Serial Num	ber:	
Discharge Size (in)	Suction	Diameter (in)		Pump Siz	e (GPM)		TDH	
Priming Pump 🗌 🛛 M	anufacturer:	Ν	lodel:		Serial	No.:	Size (hp):	
Pressure Gauge 🗌 M	anufacturer:		Pressure Rang	ge:			PressureReading:	
Field Observations:	Good 🗌 N/A 🗌 Bearing Noise 🗌 N	Seals Leaking	VibratingEvidence of	Shaft Sipe Strain	Deflection	Ca	vitating 🗌 Belts Loose	
* Pump 2	N/A							
Discharge Size (in)	Suction D	iameter (in)		Pump Size	(GPM)		TDH	
Priming Pump 🗌 Ma	inufacturer:	Mo	odel:		Serial N	lo.:	Size (hp):	
Pressure Gauge 🗌 Ma	inufacturer:		Pressure Range	e:			PressureReading:	
Field Observations: G	iood 🗌 N/A 🗌 earing Noise 🗌 N	Seals Leaking	Vibrating Evidence of F	D Shaft I Pipe Strain	Deflection	Cav	itating Belts Loose	
		Sub	mersible Pu	mps (SUB)				
* Pump 1		✓						
Manufacturer:	Barnes	Mod	el: 48.3 FIA		Seria	al:		
Discharge Size (in) 4"	Suction Di	ameter (in)		Pump Size	(GPM) 15	5	TDH 15 HP	
Field Observations: Go	bod 🗌 N/A 🗌	Rail System Corro	ded 🗌 Doe	es Not Seat V	Vell	Cables Co	rroded or Failing	
* Pump 2		~						
Manufacturer: E	Barnes	Mod	el:	I	Seria	al:		
Discharge Size (in) 4"	Suction Di	ameter (in)		Pump Size	(GPM) 15	5	TDH 15 HP	
Field Observations: 🔳 Go	ood 🗌 N/A 🗌	Rail System Corro	ded 🗌 Doe	es Not Seat V	Vell	Cables Co	rroded or Failing	
Check Valves								
* Pump 1		v						
Size (in): 4"	Manuf	acturer:		Mod	el:		Serial No:	
Field Observations: Good N/A Valve Operator Stuck Valve Seat Leaking Flanges Leaking Check Valve Not Seating Check Valve Not Operating Evidence of Pipe Strain Other Other							es Leaking nce of Pipe Strain	
* Pump 2		~						
Size (in): 4"	Manufa	acturer:		Mode	el:		Serial No:	
Field Observations: GC	ood N/A N/A Not Seating	/alve Operator Stud	ck 🗌 Valve heck Valve Not	Seat Leaking Operating	5	Flange	s Leaking Other	



Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments
		Piping and	d Valves Sucti	on Isolatio	n Valves	(70)	
* Pump 1	N/A						
Size (in):	Manuf	acturer:		Mode	el:		Serial No:
Field Observations:	Good N/A C Check Valve Not Seatin Other	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaking t Operating	g [Flange	es Leaking nce of Pipe Strain
* Pump 2	N/A						
Size (in):	Manuf	acturer:		Mode	el:		Serial No:
Field Observations:	Good N/A C Check Valve Not Seatin Other	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaking Operating	g [Flange	es Leaking Ince of Pipe Strain
		Disch	narge Isolation	Valves			
* Pump 1		~					
Size (in): 4"	Manufa	acturer:		Mode	1:		Serial No:
Field Observations:	Good N/A V Check Valve Not Seating Other Valve Vault Pipin	/alve Operator St	uck 🗌 Valve Check Valve Not	Seat Leaking Operating		Flange Eviden	s Leaking ce of Pipe Strain
* Pump 2	N/A						
Size (in):	Manuf	acturer:		Mode	el:		Serial No:
Field Observations:	Good N/A ' Check Valve Not Seating Other	Valve Operator St	tuck 🗌 Valve Check Valve Not	Seat Leaking Operating		Flange	is Leaking Ince of Pipe Strain



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Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: 2	302 Old Hwy 51, Kronenwetter, WI	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible
Engineer:	Roth Professional Solutions	Technical Se	rvices	
House Keej	ping: Good N/A Poor Lighting Sump Pump Inoperable Electric S	Tripping Hazards Present No Fall Prot Space Heater Inoperable Potential for Sho	ection	Exposure to Raw Wastewater in Dry Well tion 🗌 Other

Health and Safety Issues:

Other Observations: Wastewater Process Timing / Hydrogen Sulfide Issues

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments					
	Site Improvement (SIM)									
* Access Driveway	X									
* Parking	X			 						
* Gate and Fencing				 						
* Site Drainage	X			 						
* Grounding System	X		<u> </u>							
* Site Lighting	X									
* Site Alarm Horn and Strobe Lighting	X									
General Site Electrical Observa	General Site Electrical Observations									
Access Driveway Details: Parking Details:	Access Driveway Details: Gravel or aggregate basecourse only Concrete Pavement Bituminous Pavement Parking Details: None Gravel Paved Paved 									
Fence Details: 🖂 Chain I	∟ink └─┘ Other	Fencing Height (ft):	F	encing Length (ft):					
Gate Type: Single	Double									
Traffic: Other] Site too Close t	to Traffic							
Grounding System Grounding Rings Grounding Rods Details :										
If applicable, approximate par	If applicable, approximate parking area:									
If applicable, approximate site area:										
Other Notes: 15 HP Shinmaywa Pump Some Moisture Corrosior	os, No Screen; n Forming in Dr	Pumps Replace y Valve Vault	ed 2023							



Roth Professional Solutions

Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Structure and Wetwell (PST)								
* Building		~					(2 Structures: LS & Generator Bldg)	
Building Structures: 🗌 No	one 📕 Concrete V	Walls 🗌 Con Total Floor	ncrete Floor Area:		Plan Fl	oor Area:		
Field Observations: 📕 Goo	d 🗌 N/A 🗌 R cks on the Wall 🗌	oof Degraded [] Cracks on the F	Doors and Se	ecurity Failir _r Hydroge	ng 🗌 N n-Sulfide (leeds Paint Corrosion	Portection	
* Odor Control		✓						
Odor Details: Ver	nt Pipe] Other	Details					
Field Observations: Or	perational and in use her	On site,	but not required		es not oper	ate, needs	repair	
* Crane/Hoist		✓					Portable / Off-Site	
Crane Details: Man	ufacturer:		Model:		Se	rial Numbei	r:	
Field Observations: Goo	od operating condition	on 🗌 Does n	ot operate, requ	iires repair	Mou	nting Hard	ware intact	
* Bar Screen or Com minuter	N/A							
System Description:	No Bar Screen	Manually Raked	Bar Screen	Mechanio	cally Raked	Bar Screen	Screen Bypass Provided?	
Mechanical Bar Screens:] Manufacturer:		Model:	Seri	al Number:		Power Requirements (hp):	
Odor Details: Odor Details: Odor Odor Details:	Screens need	frequent cleaning	g 🗌 Shor	t repsonse t	ime	Odor fly r	nuisance Screens not in use	
* Flow Meter		✓					Altronex Control	
Туре: 🗌 N/	A Type: MAG 50	00 Ma	anufacturer: Sie	mens	Model:	Sitrans	Serial Number: N1M6150031	
Flow Meter Field Observation	ions: 📕 Operation	al		L	ocation			
	Other							
* Wet Well		~						
Walls: 📕 Concre	ete 🗌 Steel	Fiberglass						
Slab/Cover: 🔳 Reinfo	rced Concrete	Steel Pur	mps, motors and	d electric p	anel are n	nounted or	n cover/slab directly over wet well	
Pump Control System: 📕	Floats 🗌 Bubble	er System	Ultrasonic & Tra	nsducer				
Measurement (PPM): MPC 0-5 PSI								
Wet Well Field Observations: 📕 Good 🗌 PN/A 🗌 Hatch Damaged or Difficult to Open 📄 Wet Structure Spalling or Cracked								
Evidence of Concrete Corrosion Wet Well Needs Cleaning - Solids/Grease Other								
Hatch Field Observations: 📕 Good 🗌 Fair: Minor Corrosion to Hatches, Hinges, or Latches								
Other								
Wet Well Ladder Observations: Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion Poor: Corroded or Broken Steps; Corroded or Broken Wall Anchors Other								
Wet Well Wall Observations	Good 🗆 Fai	r: Concrete Sealar	nt Peeled or Crac	ked: Concre	te Soft at S	urface		
	Poor: Exposed	/Missing Aggregat	te; Exposed/Missi	ing Re-bar	Other	Corrosio	n Protection needs to be reapplied	
Slab/Cover Observations:	Good Fair:	Concrete or Alum	ninum Grate Sligh	ntly Corrode	d But Safe			
Poor: Concrete Aggregate Missing/Exposed; Grate Corroded or Warped; Debris Over Platform Other								



LS # 7____

Roth Professional Solutions

LIFT ST.	ATION CONDITIO	N ASSESSM	ENT FORM			
Asset Class CMMS Code	Asset Year Present Installed	Cond. Perf. Rank Rank	Utiliz. Field Observations/Co	omments		
Influent Pipe Observations: Good Fair	r: Slight Corrosion; Pipe Intact	Poor: Severe Pipe Co	rrosion 🗌 Other			
Alarm Float Observations: Good	Fair: Some Grease But Operating F	Properly Poor:	Covered in Grease or Broken 🗌 Other			
Pump Vent Line Observations: Good	Fair: Slight Corrosion But Operates	Properly; Needs Seala	nt Around Opening			
	One Vent Does Not Operate; Corroc	led or Broken Off at w				
* Dry Well			Valve Vault			
Location Type: None U	nderground pump vault with acces	s tube and ladder	Located below grade inside Lift Statio	n building		
Lighting: Yes 📕 No Cathodic Protection 📕 Not Required)					
Access Tube and Ladder Field Observations:		face Corrosion; Steps I	ntact and Solid; Minor Anchor Bolt Corrosic	วท		
Poor: Corroded o	or Broken Steps; Corroded or Broke	n Wall Anchors 📃 C	ther			
Underground Vault Observations:	N/A Good Fair: Su	rface Corrosion	Poor: Corrosion Other			
Building Floor Slabs: N/A Good	Fair: Concrete Sealant Peeled or C	racked; Concrete Soft a	t Surface			
Poor: Exposed/Missi	ng Aggregate; Exposed/Missing Re-	bar Other				
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other						
Building Walls: N/A Good	Fair: Concrete Sealant Peeled	or Cracked; Concrete S	oft at Surface			
Poor: Exposed/M	lissing Aggregate; Exposed/Missing	Re-bar 🗌 Other				
Sump Pump: No Yes Type	Model:	Power (hp):	TDH: Serial:			
Field Observations: Not Operational	Poor Floor Drainage O	ther				
* Cathodic Protection N/A						
Field Observations: Disconnected	Other					
	HVAC (HVA	N)				
* Dry Well HVAC N/A						
Asset Size:						
Field Observations: Good N/A	Old Ventilation Inope k Corroded Belts Loose or	rable 🗌 Makes r Torn 📄 Louv	Noise 🗌 Fans Vibrate ers 🗌 Roof Vents 🗌 Other			
* Wet Well HVAC N/A						
Asset Size:		· · ·				
Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn Ventilation Duct Work Corroded Louvers Roof Vents Other						
Electrical Systems (ELE)						
* Control Panel	 ✓ 					
Asset Size (Volts) 208 VAC	Single phase] Three Phase				
Manufacturer: Hoffman	Model: 48x36x12	Serial Number: 500	224-K			
Power Supply Manufacturer:	Model:		Type: 3R			



Roth Professional Solutions

Section 3, ItemD.

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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Field Observations:	Good Panel Corro Dust Inside Panel Surge Protection	oded Old / Exposed Wires Grounded C	Outdated / Ob Shop Dr. Wiring Labelle	solete 🗌 awings Avail ed 🗌 Pa	Contacts I able	Loose UL Listed	Cables Fatigued Checked Uncovered Holes ner	
* Lighting Panel	N/A							
Asset Size (Volts)	I					I		
Manufacturer:		Model:		Serial Nur	nber:			
Field Observations:	Good Panel Corro	oded Old / O	Outdated / Obso	olete 🗌 ear Worn .abelled 🗌	Contacts Lo	oose	Cables Fatigued Checked orroded Spare Spaces Available	
* Main Switch		✓						
Asset Size (Volts) 20	08 VAC							
Manufacturer:	Hoffman	Model: Type 3	R	Serial Nu	mber: 5002	224-K		
Field Observations:	Good Panel Corr Dust Inside Panel Panel Labelled	oded 🗌 Old /] Exposed Wires Other	Outdated / Obs	solete 🗌 Gear Worn	Contacts L	oose Corroded [Cables Fatigued Checked Panel Grounded	
* Transfer Switch		✓						
Asset Size (Volts								
Manufacturer:	ONAN	Model: OTB-3	385605	Serial Nu	mber:			
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other							
* Motor Control C	Center N/A							
Asset Size (Volts)								
Manufacturer:		Model:		Serial Nur	nber:			
Field Observations:	Good Panel Corro	oded 🗌 Old /] Exposed Wires	Outdated / Obs	olete 🗌 Gear Worn	Contacts Lo	cose	Cables Fatigued Checked Panel Labelled	
* Junction Box		✓					15 HP	
Asset Size (Volts)	208 VAC 30	·				I		
Manufacturer:	Hoffman	Model: Type 3	R	Serial Nur	nber: 5002	224-K		
Field Observations:	Good Panel Corro	oded 🗌 Old /] Exposed Wires Other	Outdated / Obs	olete	Contacts Lo	oose	Cables Fatigued Checked Panel Grounded	
* Miscellaneous Pa	inel 1 N/A							
Asset Size								
Manufacturer:		Model:		Serial Nu	mber:			
Field Observations:	Good Panel Corr	oded Old / Exposed Wires Other	Outdated / Obs	solete 🗌 Gear Worn	Contacts L	oose Corroded [Cables Fatigued Checked Panel Grounded	



LS # 7____

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Generator (GEN)									
* Emergency Generator		✓					Onan Cummings; A000048227		
* Emer. Gen. Connector									
Asset Size: 65 KW Manufacturer: ONAN Model: FORD Serial: 15911-1-04-98 Generator Type:									
Field Observations: Po	or Accessibility	Contacts Loose Panel Grounde	Cables Fat	igued Che Labelled	cked	Engine Fl Diesel Co	uids Low Door Housekeeping ntainment Other		
Instrumentation (INS)	SCADA		SD-4				Radio for Kronenwetter		
* Auto Dialer		✓	4710				Radio for RMSD		
Manufacturer:		Model:			Phone Nu	imber:			
Alarms: High Leve	I Low Level	Generator	Running 🗌 F	Power Fail	Othe	r			
* Float Controls	back up		2 float						
* Bubbler Controls	primary						0-5 PSI		
Manufacturer:	Mercoid	1	Model:	1		I			
* Ultrasonic Controls									
Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture Drain Condensate Traps in Air System Floats Tangled Controls Obsolete Other									
SCADA (SCA)									
Field Observations: 📕 Go	od 🗌 N/A 🗌	Obsolete 🗌 Ot	her 1400 Allen	Bradley T	elemetry S	D4 Radio	for Kronenwetter; 4710 Radio for RMMSD		
Variable Frequency Drive									
* Control Panel - VFD									
* Harmonic Filter									
* Output Filter									
Asset Size:	Manufactu	rer:		Model:	1		Observed RPM:		
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	ıky 🗌 Other		
* Motor 1		✓							
Asset Size (HP) 15	I			<u> </u>					
Manufacturer: Shinmay	/wa	Model:		9	Serial Numb	er: 4CNX	H411T2E2		
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other									
* Motor 2		✓							
Asset Size (HP): 15	Manufactu	irer: Shinmayv	la	Model:			Serial Number: 11		
Field Observations: GC C C En	Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other								



Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
		Но	or/Vert Centi	rifugal Pu	mps				
* Pump 1	N/A								
Manufacturer	:	Мос	del:			Serial Num	ber:		
Discharge Size (in)	Suction D	Diameter (in)		Pump Siz	e (GPM)		TDH		
Priming Pump	Nanufacturer:	Μ	odel:		Serial	No.:	Size (hp):		
Pressure Gauge 🗌 N	Nanufacturer:		Pressure Rang	e:			PressureReading:		
Field Observations:	Good N/A Bearing Noise N	Seals Leaking Iount Failing	VibratingEvidence of	Shaft Sipe Strain	Deflection	ner	vitating 🗌 Belts Loose		
* Pump 2	N/A								
Discharge Size (in)	Suction Di	ameter (in)		Pump Size	e (GPM)		TDH		
Priming Pump 🔄 Ma	anufacturer:	Mc	odel:		Serial N	lo.:	Size (hp):		
Pressure Gauge 🗌 Ma	anufacturer:		Pressure Range	:			PressureReading:		
Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other									
Submersible Pumps (SUB)									
* Pump 1		*							
Manufacturer: Shinmaywa Model: Serial: 11									
Discharge Size (in) 8"	Suction Dia	imeter (in)		Pump Size	(GPM) <mark>55</mark>	0	TDH 15 HP		
Field Observations: 📕 G	ood 🗌 N/A 🗌 F	Rail System Corroo	ded 🗌 Doe	s Not Seat \	Well	Cables Co	rroded or Failing		
* Pump 2		✓							
Manufacturer:	Shinmaywa	Mod	el:		Seria	al: 11			
Discharge Size (in) 8"	Suction Dia	imeter (in)		Pump Size	(GPM) 55	0	TDH 15 HP		
Field Observations: 📕 G	ood 🗌 N/A 🗌 F	Rail System Corroo	ded 🗌 Doe	s Not Seat \	Well	Cables Co	rroded or Failing		
			Check Valv	es					
* Pump 1		~							
Size (in): <mark>8</mark> "	Manufa	icturer:		Mod	lel:		Serial No:		
Field Observations: Good N/A Valve Operator Stuck Valve Seat Leaking Check Valve Not Seating Check Valve Not Operating Other Flanges Leaking Evidence of Pipe Strain Other									
* Pump 2		 							
Size (in): <mark>8</mark> "	Manufa	cturer:	L	Mod	el:	ļ	Serial No:		
Field Observations:	ood IN/A V heck Valve Not Seating	alve Operator Stud	ck 🗌 Valve heck Valve Not	Seat Leakin Operating	g	Flange	s Leaking Other ce of Pipe Strain		



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Piping and Valves Suction Isolation Valves									
* Pump 1	N/A								
Size (in):	Manufa	acturer:		Mc	del:		Serial No:		
Field Observations:	Good N/A N/A C	/alve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaki t Operating	ng	Flang	es Leaking nce of Pipe Strain		
* Pump 2	N/A								
Size (in):	Manufa	acturer:		Mo	del:		Serial No:		
Field Observations:	Good N/A V Check Valve Not Seating	/alve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaki t Operating	ng	Flang	es Leaking nce of Pipe Strain		
		Disch	narge Isolation	Valves					
* Pump 1		✓							
Size (in): <mark>8</mark>	Manufa	cturer:		Mo	del:		Serial No:		
Field Observations:	Good N/A V Check Valve Not Seating Other	alve Operator St	 Flanges Leaking Evidence of Pipe Strain 						
* Pump 2									
Size (in):	Manufa	octurer:		Мо	del:		Serial No:		
Field Observations:	Good N/A N Check Valve Not Seating Other	/alve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaki	ng	☐ Flange	es Leaking nce of Pipe Strain		



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LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Leastion, 1210 Kronenwet	ter Dr. Mosinee. W		unicipality: Village	of Kronenwetter							
	nal Salutiona	IVIU	Technical & Equipment Assistance: B&M Technical Services								
Engineer: Rout Professio			l echnical & Equi	pment Assistance:							
Sump Pump Inoperable Electric Space Heater Inoperable Potential for Shock or Electrocution Other											
Health and Safety Issues:											
Other Observations: Influer	it Lines into Wet W	ell were Full / Pos	sible Sedimentati	on; Flow Study Requ	uired						
#2 Set to Lead Only per Field Setting; Ebara Pump not working, minimal, if any, performance											
Asset Class	Asset Present	Year Installed	Cond. Perf. Rank Rank	Field Observations	s/Comments						
		Site I	Improvement (SIM)							
* Access Driveway	X										
* Parking	X										
* Gate and Fencing											
* Site Drainage	X										
* Grounding System	X										
* Site Lighting											
* Site Alarm Horn and Strobe Lighting	X										
General Site Electrical Obse	ervations										
Access Driveway Details:	Gravel or	aggregate basecour	rse only 🗌 Conc	rete Pavement	Bituminous Pavement Seal Coat						
Parking Details: N	one 🗌 Gravel	Paved									
Fence Details: 🗌 Ch	ain Link 🗌 Other	Fencing Height (ft):	: F	encing Length (ft):							
Gate Type: 🗌 Sin	gle Double										
Traffic: O	ther] Site too Close to T	Fraffic Okay								
Grounding System Present Grounding Rings Grounding Rods Details :											
If applicable, approximate	e parking area:										
If applicable, approximat	e site area:										
Other Notes:											
Deep Valve Vault, so	me, infiltration; Lor	ng Run Times (Like	ely Explained in a	bove notes); Randor	m Power Fails						

4" Gate Valve Operable, but Ticked



Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Structure and Wetwell (PST)									
* Building							Valve Vault		
Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:									
Field Observations: Good Crae	od 🔄 N/A 📃 Ri	oof Degraded [Cracks on the F	Doors and Se	curity Failir r <mark>Deep, So</mark>	ig 🗌 N ome Watei	leeds Paint on Floor			
* Odor Control		✓							
Odor Details: Ver	nt Pipe	Other	Details						
Field Observations: Or	perational and in use ther	On site,	but not required	Do	es not oper	ate, needs	repair		
* Crane/Hoist							On Site		
Crane Details: Mar	ufacturer:		Model:		Sei	rial Numbei	r:		
Field Observations: Go	od operating conditio	n 🗌 Does n	iot operate, requ	ires repair	Mou	nting Hard	ware intact		
Oth	ner								
* Bar Screen or Com minuter	N/A								
System Description: No Bar Screen Manually Raked Bar Screen Mechanically Raked Bar Screen Screen Bypass Provided?									
Mechanical Bar Screens: Manufacturer: Model: Serial Number: Power Requirements (hp):									
Odor Details: 🗌 N/A	Screens need	frequent cleaning	g 🗌 Short	t repsonse t	ime	Odor fly r	nuisance 🗌 Screens not in use		
* Flow Meter	N/A								
Type: 🗌 N/	А Туре:	M	anufacturer:	1	Model:	l.	Serial Number:		
Flow Meter Field Observat	ions: 🗌 Operationa	al			ocation				
	Other								
* Wet Well		✓							
Walls: 📕 Concre	ete 🗌 Steel 🛛	Fiberglass							
Slab/Cover: 📕 Reinfo	rced Concrete	Steel 📕 Pur	mps, motors and	d electric p	anel are m	nounted or	n cover/slab directly over wet well		
Pump Control System: 📕	Floats 🗌 Bubble	r System	Ultrasonic & Tra	nsducer					
Measurement (PPM): 0-5	PSI MPC								
Wet Well Field Observation	ns: 📕 Good 🗌 I	PN/A 🗌 Hato	ch Damaged or D	ifficult to O	pen] Wet Stru	ucture Spalling or Cracked		
	Evidence of C	oncrete Corrosio	n 🗌 Wet V	Vell Needs	Cleaning - S	olids/Grea	ise 🗌 Other		
Hatch Field Observations:	Hatch Field Observations: 📕 Good 🗌 Fair: Minor Corrosion to Hatches, Hinges, or Latches 🗌 Poor:Corroded or Broken Hatches, Hinges, or Latches								
Other									
Wet Well Ladder Observation	Wet Well Ladder Observations: Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion Poor: Corroded or Broken Steps: Corroded or Broken Wall Anchors Other								
Wet Well Wall Observations:									
	Poor: Exposed	Missing Aggregat	te; Exposed/Missi	ng Re-bar	Other				
Slab/Cover Observations:	Good 📕 Fair:	Concrete or Alum	ninum Grate Sligh	itly Corrode	d But Safe				
[Poor: Concrete Ag	gregate Missing/	Exposed; Grate	Corroded or	·Warped; D	ebris Over	Platform Other Not a Concern		



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LIFT STATION CONDITION ASSESSMENT FORM										
Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Influent Pipe Observations:	Good Eair:	Slight Corrosion	; Pipe Intact	Poor: Se	vere Pipe Co	prrosion [Other High Level Tailwater			
Alarm Float Observations: Good Fair: Some Grease But Operating Properly Poor: Covered in Grease or Broken Other										
Pump Vent Line Observations: Good Fair: Slight Corrosion But Operates Properly; Needs Sealant Around Opening										
	Poor: Any Or	ne Vent Does No	t Operate; Corroo	ded or Brok	en Off at W	all 📃 Ot	her			
* Dry Well		✓					Valve Vault			
Location Type:	Location Type: None Underground pump vault with access tube and ladder Located below grade inside building									
Lighting:	Yes No		Voc							
Cathodie Protection										
Access Tube and Ladder Field	Observations:	N/A 📕 Go Broken Steps; Co	od 🔄 Fair: Sui	rface Corros n Wall Ancl	sion; Steps I nors 🗌 C	ntact and S Other	olid; Minor Anchor Bolt Corrosion			
Underground Vault Observati	ons:	N/A 🔳 Go	od 🗌 Fair: Su	rface Corro	sion	Poor: Corr	rosion 🗌 Other			
Building Floor Slabs:	I/A 📕 Good 🗌	Fair: Concrete Se	alant Peeled or C	racked; Cor	ncrete Soft a	at Surface				
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other										
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface										
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other										
Building Walls: N/A 📕 Good 🦳 Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface										
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other										
Sump Pump: No Ye	es Type	Model:		Power (h	p):		TDH: Serial:			
Field Observations:	t Operational	Poor Floor Drai	nage 🗌 O	ther						
* Cathodic Protection	N/A									
Field Observations: Di	sconnected 🗌 C	Other								
			HVAC (HVA	A)						
* Dry Well HVAC	N/A									
Asset Size:										
Field Observations: GC	od N/A	Old Corroded	Ventilation Inope Belts Loose o	rable r Torn	Makes	Noise	Fans Vibrate Roof Vents Other			
* Wet Well HVAC	N/A									
Asset Size:	L	L				1				
Field Observations:	ood 🗌 N/A	Old V	entilation Inopera	able] Makes No	oise	Fans Vibrate 🗌 Belts Loose or Torn			
Ve	Ventilation Duct Work Corroded Louvers Roof Vents Other									
Electrical Systems (ELE)										
* Control Panel		✓					Need Pump Tags & Manuals in Panel			
Asset Size (Volts) 208		Single	e phase	Three Ph	ase					
Manufacturer: US Filte	r	Model: FPI		Serial Nu	mber: 307	257				
Power Supply Manufactu	urer:		Model:				Туре:			



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Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments				
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Shop Drawings Available UL Listed Uncovered Holes Surge Protection Grounded Wiring Labelled Panel Labelled Other										
* Lighting Panel	N/A										
Asset Size (Volts) Manufacturer:		Model:		Serial Nu	mber:						
Field Observations:	tions: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Bus and or lugs corroded Spare Spaces Available Breakers Labelled Panel Grounded Panel Labelled Other										
* Main Switch		v									
Asset Size (Volts) 20 Manufacturer:	08 VAC GE	Model: TEB 13	321	Serial Nu	mber:						
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other											
* Transfer Switch		✓					Manual				
Asset Size (Volts Manual Portable Generator 208											
Manufacturer: Model: Serial Number:											
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other Panel Labelled Other											
* Motor Control C	Center N/A										
Asset Size (Volts)											
Manufacturer:		Model:		Serial Nur	mber:						
Field Observations:	Good Panel Corro	oded 🗌 Old / d] Exposed Wires	Outdated / Obso	olete 🗌 Gear Worn	Contacts L	oose Corroded [Cables Fatigued Checked Panel Labelled				
* Junction Box		✓									
Asset Size (Volts)	48x36x12 Mounted, US F	ïlter									
Manufacturer:	Hoffman	Model: Type 3	R	Serial Nur	mber:						
Field Observations:	Good Panel Corro Dust Inside Panel Panel Labelled	oded 🔳 Old /] Exposed Wires Other	Outdated / Obso	olete 🗌 Gear Worn	Contacts L	oose Corroded [Cables Fatigued Checked Panel Grounded				
* Miscellaneous Pa	inel 1	✓					Replace Back-up Controllers; 1-2x a yr; 11 STA				
Asset Size		·				•					
Manufacturer:		Model:		Serial Nu	mber:						
Field Observations:	Good Panel Corr	oded Old / Exposed Wires Other Motor	Outdated / Obs	Gear Worn	Contacts L	oose Corroded	Cables Fatigued Checked Panel Grounded				



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Generator (GEN)									
* Emergency Generator									
* Emer. Gen. Connector		✓					Portable Off-Site		
Asset Size: N	lanufacturer:		Model:	1	Serial:		Generator Type:		
Field Observations: Good N/A Contacts Loose Cables Fatigued Checked Engine Fluids Low Poor Housekeeping Poor Accessibility Panel Grounded Panel Labelled Diesel Containment Other									
Instrumentation (INS)									
* Auto Dialer		✓							
Manufacturer: Sensa	aPhone	Model: 8	800		Phone Nu	mber: 715	-693-8244		
Alarms: 📕 High Leve	Low Level	Generator	Running 🗌 I	Power Fail	Other	Transdu	ucer 0-5 PSI		
* Float Controls	2 Float		Back up						
* Bubbler Controls									
Manufacturer:	1	I	Model:			I			
* Submersible Level Controls							0-5 PSI		
Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture									
Field Observations: Good N/A Obsolete Other									
Variable Frequency Drive									
* Control Panel - VFD	N/A								
* Harmonic Filter	N/A								
* Output Filter	N/A								
Asset Size:	Manufactu	irer:		Model:			Observed RPM:		
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	ıky 🗌 Other		
	1	1	Motors (N	/ITR)					
* Motor 1		✓							
Asset Size (HP) 10									
Manufacturer: Shinmay	/way Pumps	Model: 4C	NX	9	Serial Numb	er:			
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other									
* Motor 2	N/A								
Asset Size (HP):	Manufactu	irer:	1	Model:	1		Serial Number:		
Field Observations: Go	Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other								



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Hor/Vert Centrifugal Pumps										
* Pump 1	N/A									
Manufacturer		Мо	del:			Serial Num	ber:			
Discharge Size (in)	Suction I	Diameter (in)		Pump Siz	e (GPM)		TDH			
Priming Pump 🗌 M	anufacturer:	N	lodel:		Serial	No.:	Size (hp):			
Pressure Gauge 🗌 M	anufacturer:		Pressure Ran	ge:			PressureReading:			
Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other										
* Pump 2	N/A									
Discharge Size (in)	Suction D	iameter (in)		Pump Size	(GPM)		TDH			
Priming Pump 🗌 Ma	inufacturer:	Mo	odel:		Serial N	No.:	Size (hp):			
Pressure Gauge Ma	inufacturer:		Pressure Rang	e:			PressureReading:			
Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other										
Submersible Pumps (SUB)										
* Pump 1		 ✓ 								
Manufacturer:	EBARRA	Mod	el:		Seri	al:				
Discharge Size (in) 4"	Suction Di	ameter (in)		Pump Size	(GPM) <mark>11</mark>	0	TDH 7.5 HP			
Field Observations: Go	bod N/A	Rail System Corro	ded 🗌 Doo	es Not Seat V	Vell	Cables Co	rroded or Failing			
* Pump 2		*								
Manufacturer: S	Shinmaywa	Mod	el:	i	Seri	al: 2020				
Discharge Size (in) 4"	Suction Di	ameter (in)		Pump Size	(GPM)		TDH 5 HP			
Field Observations: 🔳 Go	bod N/A .	Rail System Corro	ded Doo	es Not Seat V	Well	Cables Co	rroded or Failing			
* Dump 1										
Size (in): /"	Manuf	ecturer:		Mod	٥ŀ		Serial No:			
				Widu			Senarivo.			
Field Observations:	Good L N/A NA NA Not Seatin	/alve Operator Stu g	ick 🖵 Valve Check Valve Not	e Seat Leakin : Operating	g	Flange Evider	es Leaking nce of Pipe Strain			
* Pump 2		~								
Size (in): 4"	Manufa	octurer:		Mode	el:	ļ	Serial No:			
Field Observations:	ood N/A N/A Not Seating	alve Operator Stu	ck 🗌 Valve heck Valve Not	Seat Leaking Operating	5	Flange	es Leaking 🗌 Other Ice of Pipe Strain			



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LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments
		Piping and	d Valves Sucti	on Isolatio	n Valves		
* Pump 1	N/A						
Size (in):	Manuf	acturer:		Mode	el:		Serial No:
Field Observations:	Good N/A C	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaking t Operating	3	Flange	es Leaking nce of Pipe Strain
* Pump 2	N/A						
Size (in):	Manuf	acturer:		Mode	el:		Serial No:
Field Observations:	Good N/A C	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaking Coperating	3	Flange	es Leaking nce of Pipe Strain
		Disch	narge Isolation	Valves			
* Pump 1		v					
Size (in): 4"	Manufa	cturer:		Mode	l:	ł	Serial No:
Field Observations:	Good N/A N/A C	/alve Operator St	uck 🗌 Valve Check Valve Not	Seat Leaking Operating		Flange	es Leaking nee of Pipe Strain
* Pump 2	N/A						
Size (in):	Manufa	acturer:		Mode	el:		Serial No:
Field Observations:	Good N/A N/A Check Valve Not Seating Other	/alve Operator St	tuck 🗌 Valve Check Valve Not	Seat Leaking Operating	5	Flange Evider	es Leaking Ince of Pipe Strain

RPS ROTH PROFESSIONAL SOLUTIONS

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LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location:	Parcel # 14527071210988, W Road, Mosinee,	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible
Engineer:	Roth Professional Solutions	Technical & Equipment Assistance: B&M Te	rvices	
House Kee	eping: Good N/A Poor Lighting	Tripping Hazards Present No Fall Protect Space Heater Inoperable Potential for Shock	ion 🗌 or Electrocu	Exposure to Raw Wastewater in Dry Well Ition Dther

Health and Safety Issues:

Other Observations: 30' D / '03 / Barnes / Ebaro

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments			
Site Improvement (SIM)								
* Access Driveway	X							
* Parking	X			 				
* Gate and Fencing				ļ				
* Site Drainage	X							
* Grounding System	X							
* Site Lighting				 				
* Site Alarm Horn and Strobe Lighting	X							
General Site Electrical Observa	tions							
Access Driveway Details: Gravel or aggregate basecourse only Concrete Pavement Bituminous Pavement Parking Details: None Gravel Paved								
Gate Type: Gate Single		Fencing neight i	,it y .	• '	encing Lengur (r.).			
Traffic: Other] Site too Close	to Traffic					
Grounding System System Grounding Rings Grounding Rods Details :								
If applicable, approximate pa	rking area:							
If applicable, approximate sit	If applicable, approximate site area:							
Other Notes: MidRail Brackets OK; Valve Vault Elbow Box Floor Drain Plugged 6" Out w/ 4" Valves Gauge Turned; Valve Vault Electrical Corner Junction Cover Off Seal Conduit Runs								



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Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Structure and Wetwell (PST)									
* Building		४							
Building Structures: 🗌 No	Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:								
Field Observations: 📕 Goo	Field Observations: Good N/A Roof Degraded Doors and Security Failing Needs Paint Cracks on the Wall Cracks on the Floor Other								
* Odor Control		✓							
Odor Details: Ver	nt Pipe	Other	Details						
Field Observations: Of	perational and in use her	On site,	but not required	Do	es not oper	ate, needs r	repair		
* Crane/Hoist		✓					Portable Off-Site		
Crane Details: Mar	nufacturer:		Model:		Se	rial Number	c.		
Field Observations: Go	od operating conditio	on 🗌 Does n	ot operate, requ	ires repair	Mou	nting Hard [,]	ware intact		
	ner								
* Bar Screen or Com minuter	N/A								
System Description:	No Bar Screen	Manually Raked	Bar Screen	Mechanio	cally Raked	Bar Screen	Screen Bypass Provided?		
Mechanical Bar Screens:	Manufacturer:		Model:	Seri	al Number:		Power Requirements (hp):		
Odor Details: N/A	Screens need	frequent cleaning	g 🗌 Shor	t repsonse t	ime	Odor fly n	nuisance 🗌 Screens not in use		
* Flow Meter	N/A								
Туре: 🗌 N/	А Туре:	M	anufacturer:		Model:		Serial Number:		
Flow Meter Field Observat	ions: 🗌 Operationa	al		L	ocation				
	Other								
* Wet Well		✓							
Walls: 📕 Concre	ete 🗌 Steel	Fiberglass							
Slab/Cover: 📕 Reinfo	rced Concrete	Steel Pur	nps, motors an	d electric p	anel are n	nounted or	n cover/slab directly over wet well		
Pump Control System: 📕	Floats 🗌 Bubble	r System	Ultrasonic [Transdu	cer w/Floa	ts			
Measurement (PPM): 0-5 PSI									
Wet Well Field Observations: 📕 Good 🗌 PN/A 🗌 Hatch Damaged or Difficult to Open 🗌 Wet Structure Spalling or Cracked									
Evidence of Concrete Corrosion Wet Well Needs Cleaning - Solids/Grease Other									
Hatch Field Observations: Good Fair: Minor Corrosion to Hatches, Hinges, or Latches Poor:Corroded or Broken Hatches, Hinges, or Latches									
Other Some Spalling									
Wet Well Ladder Observation	Wet Well Ladder Observations: Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion Poor: Corroded or Broken Steps; Corroded or Broken Wall Anchors Other								
Wet Well Wall Observations:	Good 🗔 Fair	r: Concrete Sealar	nt Peeled or Crac	ked: Concre	te Soft at S	urface			
	Poor: Exposed,	/Missing Aggregat	e; Exposed/Miss	ing Re-bar	Other				
Slab/Cover Observations:	Good Eair:	Concrete or Alum	iinum Grate Sligh	ntly Corrode	d But Safe				
	Poor: Concrete Ag	gregate Missing/	Exposed; Grate	Corroded o	r Warped; D	ebris Over	Platform Other		



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LIFT STATION CONDITION ASSESSMENT FORM								
Asset Class CMN	1S Code Asset Ye Present Insta	ar Cond. Perf. alled Rank Rank	Utiliz. Field Observations/Comments (%)					
Influent Pipe Observations: Good	Fair: Slight Corrosion; Pipe Inta	ct Poor: Severe Pipe C	prrosion Other					
Alarm Float Observations:	iood 📄 Fair: Some Grease But Ope	rating Properly Poor	Covered in Grease or Broken 🗌 Other					
Pump Vent Line Observations:	Good Eair: Slight Corrosion But O	perates Properly; Needs Seala	nt Around Opening					
E F	oor: Any One Vent Does Not Operate	; Corroded or Broken Off at W	all 🗌 Other					
* Dry Well	 ✓ 		Valve Vault					
Location Type: Nor	e 🔲 Underground pump vault wit	h access tube and ladder	Located below grade inside building					
Lighting: 📋 Yes Cathodic Protection 🔳 Not	■ No Reauired □ None □ Yes							
Access Tube and Ladder Field Observa	itions: N/A Good	Fair: Surface Corrosion: Steps	Intact and Solid: Minor Anchor Bolt Corrosion					
Poor: (Corroded or Broken Steps; Corroded o	r Broken Wall Anchors	Dther					
Underground Vault Observations:	N/A Good	Fair: Surface Corrosion	Poor: Corrosion Other					
Building Floor Slabs: N/A	Good 🦳 Fair: Concrete Sealant Pee	led or Cracked; Concrete Soft	at Surface					
Poor: Expo	sed/Missing Aggregate; Exposed/Miss	sing Re-bar 🗌 Other						
Staircases/Stairwells: N/A	Good Fair: Concrete Cracker	d; Concrete Soft at Surface						
Poor:	Exposed/Missing Aggregate; Exposed/N	Missing Re-bar 🗌 Other						
Building Walls: N/A	Good Fair: Concrete Sealant	Peeled or Cracked; Concrete S	Soft at Surface					
Field Observations:	onal 🗌 Poor Floor Drainage	Other	וחט. שנוומו.					
* Cathodic Protection N/A								
Field Observations: Disconnect	ed 🗌 Other							
	HVA							
* Dry Well HVAC N/A								
Asset Size:								
Field Observations: Good Ventilation	N/A Old Ventilatio	n Inoperable 📃 Makes	Noise Fans Vibrate					
* Wet Well HVAC N/A								
Asset Size:	I							
Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn Ventilation Duct Work Corroded Louvers Roof Vents Other								
Electrical Systems (ELE)								
* Control Panel								
Asset Size (Volts) 240 VAC	Single phase	Three Phase						
Manufacturer: US Filter	Model: Siemens Sen	tron Serial Number:						
Power Supply Manufacturer:	Model:		Туре:					



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Section 3, ItemD.

Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Uncovered Holes * Lighting Panel N/A Panel Labelled Other * Lighting Panel N/A Panel Labelled Other * Lighting Panel N/A Panel Labelled Other * Lighting Panel N/A Panel Labelled Other Cables Fatigued Checked Dast Inside Panel Exposed Wires Switch Gear Worn Bus and or lugs corroded Spare Spaces Available Breakers Labelled Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dast Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Cabelled Other * Transfer Switch Manual Asset Size (Volts) Advalual Gen Rec Manufacturer: Model: EP1 Serial Number: 400019 Pield Observations: <l< th=""><th>Asset Class</th><th>s CMMS Code Asset Year C Present Installed F</th><th>ond. Perf. Utiliz. Field Observations/Comments Rank Rank (%)</th></l<>	Asset Class	s CMMS Code Asset Year C Present Installed F	ond. Perf. Utiliz. Field Observations/Comments Rank Rank (%)
• Lighting Panel N/A Asset Size (Volts) Manufacturer: Model: Field Observations: Good Dust Inside Panel Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Panel Grounded Panel Labelled Other * Main Switch Image: Contacts Loose Cables Fatigued Checked Asset Size (Volts) 240 VAC 10 Manufacturer: Model: Sentron Mainfacturer: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manual Asset Size (Volts) 240 Manual Gen Rec Manual Manual Asset Size (Volts) 360x48x12 Madel: Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other V Manual Asset Size (Volts) 360x48x12 Manufacturer: Madel: Serial Number: Cables Fatigued Checked Panel Labelled Other Other <td< td=""><td>Field Observations:</td><td>Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Shop Drawing Surge Protection Grounded Wiring Labelled</td><td>e Contacts Loose Cables Fatigued Checked s Available UL Listed Uncovered Holes Panel Labelled Other</td></td<>	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Shop Drawing Surge Protection Grounded Wiring Labelled	e Contacts Loose Cables Fatigued Checked s Available UL Listed Uncovered Holes Panel Labelled Other
Asset Size (Volts) Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Breakers Labelled Panel Grounded Panel Labelled Other * Main Switch Image: Contacts Loose Cables Fatigued Checked Manufacturer: Serial Number: N/A Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manufacturer: Serial Number: N/A Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manufacturer: Model: Serial Number: N/A Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manufacturer: Model: Serial Number: Manual Asset Size (Volts) 2400 Manual Gen Rec Manufacturer: Manufacturer: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Du	* Lighting Panel	N/A	
Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Breakers Labelled Panel Grounded Panel Labelled other * Main Switch Spare Spare Spares Available Asset Size (Volts) 240 VAC 10 Manufacturer: Serial Number: N/A Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Gorounded # Transfer Switch Manual Asset Size (Volts) 240 Manual Gen Rec Manufacturer: Model: Serial Number: Field Observations: © Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded # Asset Size (Volts) 36x48x12 Serial Number: Panel Grounded Other <td>Asset Size (Volts)</td> <td></td> <td></td>	Asset Size (Volts)		
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Breakers Labelled Panel Grounded Panel Labelled Other * Main Switch Switch Gear Worn Bus and or lugs corroded Spare Spaces Available * Main Switch Other * Main Switch Asset Size (Voits) 240 VAC 10 Manufacturer: Madel: Sentron Serial Number: NA Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Corounded * Transfer Switch Manual Asset Size (Voits 240 Manual Gen Rec Manufacturer: Model: Serial Number: Manual Panel Labelled Other * Motor Control Center Other Serial Number: Panel Labelled Other * Motor Control Center Asset Size (Voits) So	Manufacturer:	Model: Se	rial Number:
Main Switch I Asset Size (Volts) 240 VAC 10 Manufacturer: Stemens Model: Sentron Serial Number: N/A Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Contacts Loose Cables Fatigued Checked Panel Labelled Other Transfer Switch Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Model: FP1 Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Motor Control Center Model: FP1 Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Junction Box Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Model: Serial Number: Field Observations: Good Panel Corroded Old Old / Outdated / Obsolete Ontacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Model: Serial Number: Field Observations: Good Panel Corroded Old Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dus	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Switch Gear W Breakers Labelled Panel Grounded Panel Labelle	Contacts Loose Cables Fatigued Checked /orn Bus and.or lugs corroded Spare Spaces Available ed Other
Asset Size (Volts) 240 VAC 10 Manufacturer: Siemens Model: Sentron Serial Number: N/A Field Observations:	* Main Switch		
Manufacturer: Serial Number: N/A Field Observations: Good Panel Corroded Otd / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Corroded Other Transfer Switch Panel Labelled Other Transfer Switch Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Asset Size (Volts) 36x48x12 Model: FP1	Asset Size (Volts) 24	40 VAC 10	
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Grounded Panel Labeled Other * Transfer Switch Panel Labeled Other * Transfer Switch Panel Corroded Other * Transfer Switch Manual Asset Size (Volts 240 Manual Gen Rec Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Labelled Other * Motor Control Center Model: FP1 Serial Number: 400019 Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labeled	Manufacturer:	Siemens Model: Sentron Se	rial Number: N/A
* Transfer Switch Image: Control Center Manual Asset Size (Volts) Good _ Panel Corroded _ Old / Outdated / Obsolete _ Contacts Loose _ Cables Fatigued Checked _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Grounded * Motor Control Center Image: Contacts Loose _ Cables Fatigued Checked _ Dust Inside Panel _ Other * Motor Control Center Image: Contacts Loose _ Cables Fatigued Checked _ Dust Inside Panel _ Other * Motor Control Center Image: Contacts Loose _ Cables Fatigued Checked _ Dust Inside Panel _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Labelled _ Other * Junction Box Image: Contacts Loose _ Cables Fatigued Checked _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Labelled _ Other * Junction Box Image: Contacts Loose _ Cables Fatigued Checked _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Labelled _ Other * Junction Box Image: _ Serial Number: Field Observations: Good _ Panel Corroded _ Old / Outdated / Obsolete _ Contacts Loose _ Cables Fatigued Checked _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Grounded _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Grounded _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Grounded _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Grounded _ Other _ Dust Inside Panel _ Exposed Wires _ Switch Gear Worn _ Lugs Corroded _ Panel Grounded _ Other _ Dust Inside Panel _ Exposed Wires	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Switch Gear Panel Labelled Other	Contacts Loose Cables Fatigued Checked Worn Lugs Corroded Panel Grounded
Asset Size (Volts 240 Manual Gen Rec Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Other Out Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other * Motor Control Center /// Asset Size (Volts) 36x48x12 Manufacturer: Model: FP1 Serial Number: 400019 Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box // Asset Size (Volts) 36x48x12 Model: Serial Number: Field Observations: I Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box // Asset Size (Volts) 36x48x12 Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Expo	* Transfer Switch		Manual
Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Labelled Other Lugs Corroded Panel Grounded * Motor Control Center Image: Control Center Image: Contacts Loose Panel Grounded Asset Size (Volts) 36x48x12 Manufacturer: Hoffman Model: FP1 Serial Number: 400019 Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Imature: Model: FP1 Serial Number: Panel Labelled Other Other Imature: Switch Gear Worn Lugs Corroded Panel Labelled Other V Imature: Model: Serial Number: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn	Asset Size (Volts	s 240 Manual Gen Rec	
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Motor Control Center Asset Size (Volts) 36x48x12 Manufacturer: Hoffman Model: FP1 Serial Number: 400019 Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Junction Box V Asset Size (Volts) Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wire	Manufacturer:	Model: Se	rial Number:
* Motor Control Center ✓ Image: Serial Number: 400019 Asset Size (Volts) 36x48x12 Manufacturer: Hoffman Model: FP1 Serial Number: 400019 Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other V Image: Serial Number: Image: Serial Number: Serial Number: Asset Size (Volts) 36x48x12 Image: Serial Number: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manufacturer: Model: Serial Number: Serial Number: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Miscellaneous Panel 1 N/A Asset Size	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Switch Gear Panel Labelled Other	e Contacts Loose Cables Fatigued Checked Worn Lugs Corroded Panel Grounded
Asset Size (Volts) 36x48x12 Manufacturer: Hoffman Model: FP1 Serial Number: 400019 Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box Asset Size (Volts) 36x48x12 Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other * Miscellaneous Panel 1 N/A Asset Size Masset Size	* Motor Control C	Center 🖌	
Manufacturer: Hoffman Model: FP1 Serial Number: 400019 Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other V V Image: Contacts Loose Cables Fatigued Checked Asset Size (Volts) 36x48x12 Model: Serial Number: Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Manufacturer: Model: Serial Number: Serial Number: Cables Fatigued Checked Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Switch Gear Worn Lugs Corroded Panel Grounded Asset Size Size Switch Gear Worn Lugs Corroded Panel Grounded <t< td=""><td>Asset Size (Volts)</td><td>36x48x12</td><td></td></t<>	Asset Size (Volts)	36x48x12	
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box Asset Size (Volts) 36x48x12 Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other * Miscellaneous Panel 1 N/A	Manufacturer:	Hoffman Model: FP1 Ser	rial Number: 400019
* Junction Box Image: Second conditions of the second conditis of the secon	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Switch Gear V Other	Contacts Loose Cables Fatigued Checked Norn Lugs Corroded Panel Labelled
Asset Size (Volts) 36x48x12 Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Asset Size Miscellaneous Panel 1 N/A	* Junction Box		
Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other * Miscellaneous Panel 1 N/A Asset Size	Asset Size (Volts)	36x48x12	· · · · · ·
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Asset Size Set Size	Manufacturer:	Model: Ser	rial Number:
Miscellaneous Panel 1 N/A Asset Size	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Switch Gear V Panel Labelled Other	Contacts Loose Cables Fatigued Checked Norn Lugs Corroded Panel Grounded
Asset Size	* Miscellaneous Pa	anel 1 N/A	
	Asset Size		
Manufacturer: Model: Serial Number:	Manufacturer:	Model: Se	rial Number:
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Dust Inside Panel Exposed Wires Switch Gear Panel Labelled Other	e Contacts Loose Cables Fatigued Checked Worn Lugs Corroded Panel Grounded



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments		
Generator (GEN)									
* Emergency Generator									
* Emer. Gen. Connector		✓	Portable						
Asset Size: N	Asset Size: Manufacturer: Model: Serial: Generator Type:								
Field Observations: Good N/A Contacts Loose Cables Fatigued Checked Engine Fluids Low Poor Housekeeping Diesel Containment Other 									
Instrumentation (INS)									
* Auto Dialer		✓							
Manufacturer: Dialog	g Elite	Model:	Antx		Phone Nu	umber: 715	-359-5503		
Alarms: 🗌 High Leve	I Low Level	Generator	Running 🗌 I	Power Fail	Othe	r			
* Float Controls	Back Up	~	2 Floats						
* Bubbler Controls		~							
Manufacturer:	Mercoid	1	Model: MPC	Junior 0-5	PSI				
* Submersible Level Control		✓							
Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture									
			SCADA	(SCA)					
Field Observations: 📕 Go	od 🗌 N/A 🗌	Obsolete	Other						
Variable Frequency Drive									
* Control Panel - VFD	N/A								
* Harmonic Filter	N/A								
* Output Filter	N/A								
Asset Size:	Manufactu	rer:		Model:	1	1	Observed RPM:		
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	ıky 🗌 Other		
		1	Motors (N	VITR)					
* Motor 1		✓							
Asset Size (HP) 5									
Manufacturer: Barnes Model: Sub Serial Number:									
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other									
* Motor 2		✓							
Asset Size (HP): 5	Manufactu	irer: EBARA	1	Model:			Serial Number:		
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other									



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Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Hor/Vert Centrifugal Pumps								
* Pump 1	N/A							
Manufacturer		Mc	odel:			Serial Num	ber:	
Discharge Size (in)	Suction I	Diameter (in)		Pump Siz	e (GPM)		TDH	
Priming Pump 🗌 🛛 M	anufacturer:	Ν	/lodel:		Serial	No.:	Size (hp):	
Pressure Gauge 🗌 M	anufacturer:		Pressure Ran	ge:			PressureReading:	
Field Observations:	Good 🗌 N/A 🗌 Bearing Noise 🗌 N	Seals Leaking Aount Failing [VibratingEvidence of	Shaft Sipe Strain	Deflection	Ca ner	vitating 🗌 Belts Loose	
* Pump 2	N/A							
Discharge Size (in)	Suction D	iameter (in)		Pump Size	e (GPM)		TDH	
Priming Pump 🗌 Ma	inufacturer:	М	odel:		Serial N	lo.:	Size (hp):	
Pressure Gauge Ma	inufacturer:		Pressure Rang	e:			PressureReading:	
Field Observations:	iood 🗌 N/A 🗌 earing Noise 🗌 M	Seals Leaking ount Failing	VibratingEvidence of I	Shaft I Sipe Strain	Deflection	Cav	itating Belts Loose	
		Sub	omersible Pu	mps (SUB)				
* Pump 1		✓						
Manufacturer:	11	Mod	del:	<u> </u>	Seria	al:		
Discharge Size (in) 6"	Suction Dia	ameter (in)		Pump Size	(GPM) 13	5 +/-	TDH 3-5 HP	
Field Observations:	ood 🗌 N/A 🗌	Rail System Corro	oded 🗌 Doe	es Not Seat \	Well	Cables Co	prroded or Failing	
* Pump 2		✓						
Manufacturer:	11	Mod	del:	<u> </u>	Seria	al:		
Discharge Size (in) 6"	Suction Dia	ameter (in)		Pump Size (GPM) TDH				
Field Observations: 📕 Go	Field Observations: Good N/A Rail System Corroded Does Not Seat Well Cables Corroded or Failing Other Other							
* * *								
* Pump 1							C. dalar	
Size (in): 4"		acturer:		IVIOO	lei:		Serial No:	
Field Observations:	iood I N/A I N/A I N/A I N/A I N/A I Not Seatin	/alve Operator Stu	uck 🗔 Valve Check Valve Not	e Seat Leakin Coperating	g	Flange Evider	es Leaking nce of Pipe Strain	
* Pump 2		 Image: A start of the start of						
Size (in): 4"	Manufa	cturer:		Mod	el:		Serial No:	
Field Observations:	ood N/A V v eck Valve Not Seating	alve Operator Stu	ick 🗌 Valve Check Valve Not	e Seat Leaking Operating	g	Flange	es Leaking Other	



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LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
	Piping and Valves Suction Isolation Valves							
* Pump 1	N/A							
Size (in):	Manuf	acturer:		Mode	el:		Serial No:	
Field Observations:	Good N/A C	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaking t Operating	3	Flange	es Leaking nce of Pipe Strain	
* Pump 2	N/A							
Size (in):	Manuf	acturer:		Mode	el:		Serial No:	
Field Observations:	Good N/A C	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaking Coperating	3	Flange	es Leaking nce of Pipe Strain	
		Disch	narge Isolation	Valves				
* Pump 1		v						
Size (in): 4"	Manufa	cturer:		Mode	l:	ł	Serial No:	
Field Observations:	Good N/A N/A C	/alve Operator St	uck 🗌 Valve Check Valve Not	Seat Leaking Operating		Flange	es Leaking nee of Pipe Strain	
* Pump 2	N/A							
Size (in):	Manufa	acturer:		Mode	el:		Serial No:	
Field Observations:	Good N/A N/A Check Valve Not Seating Other	/alve Operator St	tuck 🗌 Valve Check Valve Not	Seat Leaking Operating	5	Flange Evider	es Leaking Ince of Pipe Strain	

RPS ROTH PROFESSIONAL SOLUTIONS

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LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: 2	2371 Mystic Meadow Dr, Mosinee, Wi	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible
Engineer:	Roth Professional Solutions	Technical & Equipment Assistance: B&M Tech	rvices	
House Kee	ping: Good N/A Poor Lighting Sump Pump Inoperable Electric S	Tripping Hazards Present No Fall Protectic Space Heater Inoperable Potential for Shock or	n 🗌 Electrocu	Exposure to Raw Wastewater in Dry Well ition 🗌 Other

Health and Safety Issues:

Other Observations: 2004/2005, Small Rags, Single Phase Barnes 3 HP, 4" Discharge, 4" Valves

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments			
Site Improvement (SIM)								
* Access Driveway	Access Driveway C-D-S							
* Parking	* Parking C-D-S							
* Gate and Fencing	X							
* Site Drainage				ļ	Issues Possible			
* Grounding System								
* Site Lighting	X							
* Site Alarm Horn and Strobe Lighting	X							
General Site Electrical Observa	itions							
Access Driveway Details: Parking Details: 🗌 None	Gravel or	aggregate basec	:ourse only d	Concr	rete Pavement 🔳 Bituminous Pavement			
Fence Details: 🗌 Chain	Link 🗌 Other	Fencing Height ((ft):	F	encing Length (ft):			
Gate Type: 🗌 Single	Double							
Traffic: Other	r 📕	Site too Close 1	to Traffic F	3ut No Iss	ues Except for Salt Degradation on Concrete			
Grounding System Prese Details :	Grounding System Present Grounding Rings Grounding Rods Details :							
If applicable, approximate pa	arking area:							
If applicable, approximate sit	te area:							
Other Notes:								
Valve Vault Infiltration; S	3lab Concrete Is	sues, Epoxy Se	aler					
Cable Organization; Floor Drain in Valve Vault								



LS # <mark>10</mark>

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Structure and Wetwell (PST)								
* Building		✓					Valve Vault	
Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:								
Field Observations: Good N/A Roof Degraded Doors and Security Failing Needs Paint								
* Odor Control								
Odor Details: 📄 Ver	nt Pipe	Other	Details	1		I	1	
Field Observations:	Field Observations: Operational and in use On site, but not required Does not operate, needs repair							
* Crane/Hoist		✓					Portable Off-Site	
Crane Details: Man	ufacturer:		Model:		Se	rial Number	r:	
Field Observations: Goo	od operating conditio	n 🗌 Does n	ot operate, requ	iires repair	Mou	nting Hard	ware intact	
* Bar Screen or Com minuter	N/A							
System Description:	No Bar Screen	Manually Raked	Bar Screen	Mechanio	ally Raked	Bar Screen	Screen Bypass Provided?	
Mechanical Bar Screens:	Manufacturer:		Model:	Seri	al Number:		Power Requirements (hp):	
Odor Details: N/A	Screens need	frequent cleaning	z Short	t repsonse t	ime	Odor fly r	nuisance Screens not in use	
☐ Oth	er							
* Flow Meter	N/A							
Type: 🗌 N/	А Туре:	M	anufacturer:		Model:		Serial Number:	
Flow Meter Field Observation	ons: 🗌 Operation	al		L	ocation			
	Other							
* Wet Well		✓						
Walls: 📕 Concre	ete 🗌 Steel	Fiberglass						
Slab/Cover: 📕 Reinfo	rced Concrete	Steel Pur	mps, motors and	d electric p	anel are n	nounted or	n cover/slab directly over wet well	
Pump Control System: 📕	Floats 🗌 Bubble	r System	Ultrasonic	Transduc	er w/Floats			
Measurement (PPM): 0-5	PSI MPC							
Wet Well Field Observation	s: 📕 Good 🗌	PN/A 🗌 Hate	ch Damaged or D	oifficult to O	pen] Wet Stru	ucture Spalling or Cracked	
Evidence of Concrete Corrosion Wet Well Needs Cleaning - Solids/Grease Other								
Hatch Field Observations: 🔲 Good 🦳 Fair: Minor Corrosion to Hatches, Hinges, or Latches 🦳 Poor:Corroded or Broken Hatches, Hinges, or Latches								
☐ Other								
Wet Well Ladder Observation	Wet Well Ladder Observations: Good Fair: Surface Corrosion; Steps Intact and Solid; Minor Anchor Bolt Corrosion							
	Poor: Corr	oded or Broken S	teps; Corroded or	r Broken Wa	all Anchors	Other		
Wet Well Wall Observations:	Good Fai	r: Concrete Sealar	nt Peeled or Crack	ked; Concre	te Soft at S	urface		
		wilsonig Aggrega	.e, LAPUSEU/IVIISSI	ing ive-ngi				
Slab/Cover Observations:	Good Fair:	Concrete or Alum	inum Grate Sligh	ntly Corrode	d But Safe	ehris Over	Platform C Other	
		BI CBULC MISSING	Exposed, Grate	con oueu Ol	waipeu, L	cons Over		



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Roth Professional Solutions

	LIFT ST/	ATION CO	ONDITIO	N ASS	ESSM	ENT F	ORM
Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments
Influent Pipe Observations:	Good 🗌 Fair:	Slight Corrosion	; Pipe Intact	Poor: Se	vere Pipe Co	prrosion [Other
Alarm Float Observations:	Good	Fair: Some Greas	e But Operating I	Properly	Poor:	Covered in	Grease or Broken 🗌 Other
Pump Vent Line Observations:	Good Poor: Any O	Fair: Slight Corros	sion But Operates	s Properly; I ded or Brok	Needs Sealai en Off at Wa	nt Around o	Opening her
* Dry Well	N/A	✓					Valve Vault
Location Type:		dorground num	a vault with accord	s tubo and	laddor		ted below grade inside building
Lighting:	Yes No				lauuei		
Cathodic Protection	Not Required	None	Yes				
Access Tube and Ladder Field	Observations:	N/A 📕 Go	od 🗌 Fair: Su	rface Corro	sion; Steps l	ntact and S	olid; Minor Anchor Bolt Corrosion
	Poor: Corroded or	^r Broken Steps; C	orroded or Broke	n Wall Anc	hors 🗌 O	ther	
Underground Vault Observation	ons: [N/A 📕 Go	od 🗌 Fair: Su	rface Corro	sion	Poor: Cor	rosion 🗌 Other
Building Floor Slabs: N	I/A 📕 Good 🗌	Fair: Concrete Se	ealant Peeled or C	cracked; Co	ncrete Soft a	at Surface	
Po	or: Exposed/Missin	g Aggregate; Exp	osed/Missing Re-	-bar 🗌 C	other		
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other							
Building Walls: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface							
Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other							
Sump Pump: No Ye	Sump Pump: No Yes Type Model: Power (hp): TDH: Serial:						TDH: Serial:
Field Observations: No	t Operational	Poor Floor Drai	nage 🗌 O	ther			
* Cathodic Protection	N/A						
Field Observations:	sconnected	Other					
		-	HVAC (HV/	A)	-		
* Dry Well HVAC	N/A						
Asset Size:							
Field Observations: Go	od N/A	Old	Ventilation Inope	erable r Torn	Makes	Noise [Fans Vibrate
* Wet Well HVAC	N/A						
Asset Size:							
Field Observations:	ood 🗌 N/A 🗌	Old V	entilation Inopera	able] Makes No	oise	Fans Vibrate 🗌 Belts Loose or Torn
Ve	entilation Duct Worl	k Corroded	Louvers	Roof Vent	s 🗌 Oth	her	
Electrical Systems (ELE)							
* Control Panel		~					
Asset Size (Volts) 240 VAC		Single	e phase] Three Ph	ase		
Manufacturer: Cutler H	ammer	Model:		Serial Nu	mber: E19	2893	
Power Supply Manufactu	ırer:		Model:				Туре:



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Roth Professional Solutions

Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Field Observations:	Good Panel Corro Dust Inside Panel Surge Protection	ded Old / Exposed Wires Grounded D	Outdated / Obs	solete wings Avail d P	Contacts I able	Loose	Cables Fatigued Checked Uncovered Holes her	
* Lighting Panel	N/A							
Asset Size (Volts)								
Manufacturer:		Model:		Serial Nu	mber:			
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Bus and.or lugs corroded Spare Spaces Available Breakers Labelled Panel Grounded Panel Labelled Other							
* Main Switch		✓						
Asset Size (Volts) 24	IO VAC							
Manufacturer:	Cutler Hammer	Model:		Serial Nu	mber: E19	2893		
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other							
* Transfer Switch		✓					Manual	
Asset Size (Volts	240 VAC Single Phase							
Manufacturer:		Model:		Serial Nu	mber: N/A			
Field Observations:	Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other Other							
* Motor Control C	Center N/A	✓						
Asset Size (Volts)	36x48x12 304SS	<u> </u>						
Manufacturer:	Hoffman	Model: 304SS		Serial Nur	mber:			
Field Observations:	Good Panel Corro	ded Old / C Exposed Wires	Dutdated / Obso	olete 🗌 iear Worn	Contacts L	oose 🗌 Corroded [Cables Fatigued Checked Panel Labelled	
* Junction Box	N/A							
Asset Size (Volts)		i.						
Manufacturer:		Model:		Serial Nur	nber:			
Field Observations:	Good Panel Corro Dust Inside Panel Panel Labelled	ded Old / C Exposed Wires Other	Dutdated / Obso	olete 🗌 iear Worn	Contacts L	oose Corroded [Cables Fatigued Checked Panel Grounded	
* Miscellaneous Pa	inel 1 N/A							
Asset Size								
Manufacturer:		Model:		Serial Nu	mber:			
Field Observations:	Good Panel Corro	oded Old / O Exposed Wires Other	Outdated / Obs	olete 🗌 Gear Worn	Contacts L	oose	Cables Fatigued Checked Panel Grounded	



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Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Generator (GEN)								
* Emergency Generator	N/A							
* Emer. Gen. Connector		✓					Portable Off-Site	
Asset Size: Manufacturer: Model: Serial: Generator Type:								
Field Observations: Go	od N/A	Contacts Loose] Panel Grounde	Cables Fat	tigued Che Labelled	cked	Engine Fl Diesel Co	uids Low Poor Housekeeping ntainment Other	
Instrumentation (INS)								
* Auto Dialer	Sensaphone	✓						
Manufacturer: Sensa	aphone	Model: 1	104	4	Phone Nu	umber: 715	-355-1588	
Alarms: 📕 High Leve	l 📕 Low Level	Generator	Running 📕 F	Power Fail	Othei	r		
* Float Controls	2F	~					2 Float Back up	
* Bubbler Controls								
Manufacturer:			Model:					
* Submersible	Level X ducer	 ✓ 	T				0-5 PSI E & H	
Field Observations: Goo	Field Observations: Good N/A Bubbler Compressor Failing Air Lines Clogged / Full of Moisture Drain Condensate Traps in Air System Floats Tangled Controls Obsolete Other							
			SCADA ((SCA)				
Field Observations: Go	od 🗌 N/A 🗌	Obsolete	Other					
Variable Frequency Drive								
* Control Panel - VFD	N/A							
* Harmonic Filter	N/A							
* Output Filter	N/A		「 <u> </u>	T				
Asset Size:	Manufactu	irer:		Model:			Observed RPM:	
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	ıky 🗌 Other	
	1	·	Motors (N	ИTR)	·	r	1	
* Motor 1		✓						
Asset Size (HP) 3								
Manufacturer: Barnes		Model: Sub)	ç	Serial Numb	er:		
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other								
* Motor 2		✓						
Asset Size (HP): 3	Manufactu	irer: Barnes	1	Model: St	ıb	<u></u>	Serial Number:	
Field Observations: Good N/A Makes Noise Vibrates Shaft Bearing Noise Opposite End Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other								



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Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
		н	lor/Vert Cent	rifugal Pu	mps			
* Pump 1	N/A							
Manufac	turer:	Мс	odel:			Serial Num	ber:	
Discharge Size (in)	Suction	Diameter (in)		Pump Siz	e (GPM)		TDH	
Priming Pump	Manufacturer:	Ν	/lodel:		Serial	No.:	Size (hp):	
Pressure Gauge	Manufacturer:		Pressure Rang	ge:			PressureReading:	
Field Observations:	Good N/A	Seals Leaking Aount Failing	VibratingEvidence of	Shaft Sipe Strain	Deflection	n 🗌 Cav her	vitating 🗌 Belts Loose	
* Pump 2	N/A							
Discharge Size (in)	Suction D	iameter (in)		Pump Size	e (GPM)		TDH	
Priming Pump	Manufacturer:	Μ	lodel:		Serial I	No.:	Size (hp):	
Pressure Gauge	Manufacturer:		Pressure Range	e:			PressureReading:	
Field Observations: [Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other							
Submersible Pumps (SUB)								
* Pump 1	N/A							
Manufactu	rer:	Mo	del:		Seri	al:		
Discharge Size (in)	Suction Di	ameter (in)		Pump Size	(GPM)		TDH	
Field Observations:	Good N/A	Rail System Corro	oded 🗌 Doe	es Not Seat \	Well	Cables Co	rroded or Failing	
* Pump 2	N/A							
Manufactu	rer:	Мо	del:		Seri	al:		
Discharge Size (in)	Suction Di	ameter (in)		Pump Size	(GPM)		TDH	
Field Observations:	Good N/A	Rail System Corrc	oded 🗌 Doe	es Not Seat \	Well	Cables Co	rroded or Failing	
			Check Valv	/es				
* Pump 1	N/A							
Size (in):	Manuf	acturer:		Mod	lel:		Serial No:	
Field Observations: [[Good N/A Check Valve Not Seatin	/alve Operator Sti g	uck 🗌 Valve Check Valve Not	e Seat Leakin Operating	Ig	Flange	es Leaking nce of Pipe Strain	
* Pump 2	N/A							
Size (in):	Manufa	acturer:		Mod	el:		Serial No:	
Field Observations:	Good N/A N/A	/alve Operator Stu	uck 🗌 Valve Check Valve Not	Seat Leakin Operating	g	Flange	s Leaking Other ice of Pipe Strain	



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Roth Professional Solutions

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank_	Utiliz. (%)	Field Observations/Comments
		Piping an	d Valves Sucti	on Isolati	on Valve	s	
* Pump 1	N/A						
Size (in):	Manuf	acturer:	<u> </u>	Mo	del:		Serial No:
Field Observations:	: Good N/A Valve Operator Stuck Valve Seat Leaking Check Valve Not Seating Check Valve Not Operating Other					Flang	es Leaking nce of Pipe Strain
* Pump 2	N/A						
Size (in):	Manuf	acturer:		Mo	del:		Serial No:
Field Observations:	Good N/A Check Valve Not Seating	Valve Operator S	tuck 🗌 Valve Check Valve Not	e Seat Leaki t Operating	ng	Flang Flang Evide	es Leaking nce of Pipe Strain
		Disch	arge Isolation	Valves			
* Pump 1	N/A						
Size (in):	Manufa	acturer:		Mod	lel:		Serial No:
Field Observations:	Good N/A Valve Operator Stuck Valve Seat Leaking Check Valve Not Seating Check Valve Not Operating Other					Flange	es Leaking nce of Pipe Strain
* Pump 2	N/A						
Size (in):	Manufa	acturer:		Mo	del:		Serial No:
Field Observations:	Good N/A	/alve Operator Si g □	cuck 🗌 Valve Check Valve Not	e Seat Leakir	ng	Flange	es Leaking nce of Pipe Strain

		4	4	
10	#	1		
LD	H+			

Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: F	Parcel #:14527072140096, Glade Ct	Municipality: Village of Kronenwetter	LS Type:	Duplex Submersible
Engineer:	Roth Professional Solutions	Technical & Equipment Assistance: B&M Te	chnical Se	rvices
House Kee	ping: Good N/A Poor Lighting Sump Pump Inoperable Electric S	Tripping Hazards Present No Fall Protec pace Heater Inoperable Potential for Shock	tion	Exposure to Raw Wastewater in Dry Well ution Dther

Health and Safety Issues:

Other Observations: Rags Issues, PH Conversion

Asset Class	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Field Observations/Comments					
Site Improvement (SIM)										
* Access Driveway	X									
	V									
* Parking										
* Gate and Fencing										
* Site Drainage	X				Paved Drainage Okay					
* Grounding System	<u>×</u>									
* Site Lighting										
* Site Alarm Horn and Strobe Lighting	X									
General Site Electrical Observations										
Access Driveway Details:	Gravel or	aggregate base	course only	Concr	ete Pavement 📕 Bituminous Pavement					
Parking Details: 🗌 None	Gravel	Pave	d							
Fence Details: 🗌 Chain	Link 🗌 Other	Fencing Height	(ft):	F	encing Length (ft): N/A					
Gate Type: 🗌 Single	Double	N/A								
Traffic: Other	. [] Site too Close	to Traffic N	/A						
Grounding System Prese Details :	Grounding System System Grounding Rings Grounding Rods Details :									
If applicable, approximate pa	rking area:									
If applicable, approximate sit	e area:									
Other Notes:										
Vortexing From Influent	Vortexing From Influent									



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Roth Professional Solutions

Section 3, ItemD.

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments	
Structure and Wetwell (PST)								
* Building		✓					Valve Vault	
Building Structures: 🗌 No	one 📕 Concrete V	Valls 📕 Cor Total Floor A	ncrete Floor Area:		Plan Fl	oor Area:		
Field Observations: Goo	od 🗌 N/A 🗌 R cks on the Wall 🗌	oof Degraded [] Cracks on the F	Doors and Se	ecurity Failir er	ng 🗌 N	leeds Paint		
* Odor Control		✓						
Odor Details: Ver	nt Pipe	Other 🗌 I	Details					
Field Observations: Or	perational and in use ther	On site, l	but not required	Do Do	es not oper	ate, needs i	repair	
* Crane/Hoist		~					Portable Off-Site	
Crane Details: Mar	nufacturer:		Model:		Sei	rial Number		
Field Observations: Go	od operating conditio	on 🗌 Does n	ot operate, requ	ires repair	Mou	nting Hard	ware intact	
	ner							
* Bar Screen or Com minuter	N/A							
System Description:	No Bar Screen	Manually Raked I	Bar Screen	Mechanio	ally Raked	Bar Screen	Screen Bypass Provided?	
Mechanical Bar Screens: Manufacturer: Model: Serial Number: Power Requirements (bp):								
Odor Details: N/A	Screens need	frequent cleaning	- Shor	t repsonse t	ime	Odor fly r	nuisance Screens not in use	
☐ Oth	ier		,			e u e i ny i		
* Flow Meter	N/A							
Type: 🗌 N/	'А Туре:	Ma	anufacturer:		Model:		Serial Number:	
Flow Meter Field Observat	ions: 🗌 Operation	al			ocation			
	Other							
* Wet Well		~						
Walls: 📕 Concre	ete 🗌 Steel	Fiberglass						
Slab/Cover: 🔳 Reinfo	orced Concrete	Steel Pur	nps, motors an	d electric p	anel are m	nounted or	n cover/slab directly over wet well	
Pump Control System: 📕	Floats Bubble	r System	Ultrasonic	Transduc	er 0-5 PS	51		
Measurement (PPM): MPC	>							
Wet Well Field Observation	Wet Well Field Observations: 🔳 Good 🗌 PN/A 🔄 Hatch Damaged or Difficult to Open 🔄 Wet Structure Spalling or Cracked							
Evidence of Concrete Corrosion Wet Well Needs Cleaning - Solids/Grease Other								
Hatch Field Observations:	Hatch Field Observations: 📕 Good 🗌 Fair: Minor Corrosion to Hatches, Hinges, or Latches 📄 Poor:Corroded or Broken Hatches, Hinges, or Latches							
Other								
Wet Well Ladder Observation	is: Good	Fair: Surface Cor	rosion; Steps Int	act and Soli	d; Minor An	ichor Bolt C	Corrosion	
	Poor: Corr	oded or Broken St	teps; Corroded o	r Broken Wa	all Anchors [Other		
Wet Well Wall Observations:	📕 Good 🥅 Fai	r: Concrete Sealar	nt Peeled or Crac	ked; Concre	te Soft at S	urface		
	Poor: Exposed,	/Missing Aggregat	e; Exposed/Miss	ing Re-bar	Other			
Slab/Cover Observations:	Good Fair:	Concrete or Alum	inum Grate Sligh	ntly Corrode	d But Safe			
	Poor: Concrete Ag	gregate Missing/	Exposed; Grate	Corroded o	^r Warped; D	ebris Over	Platform Other	



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Roth Professional Solutions

LIFT STATION CONDITION ASSESSM	ENT FORM						
Asset Class CMMS Code Asset Year Cond. Perf. Present Installed Rank Rank	Utiliz. Field Observations/Comments (%)						
Influent Pipe Observations: 📕 Good 🗌 Fair: Slight Corrosion; Pipe Intact 🗌 Poor: Severe Pipe Co	rrosion Other Some Vortexing						
Alarm Float Observations: Good Fair: Some Grease But Operating Properly Poor:	Covered in Grease or Broken 🗌 Other						
Pump Vent Line Observations: Good Fair: Slight Corrosion But Operates Properly; Needs Sealant Around Opening Poor: Any One Vent Does Not Operate; Corroded or Broken Off at Wall Other							
* Dry Well	Valve Vault						
Location Type: None Underground pump vault with access tube and ladder Lighting: Yes No Cathodic Protection Not Required None Yes	Location Type: None Underground pump vault with access tube and ladder Lighting: Yes No Cathodic Protection Not Required None Yes						
Access Tube and Ladder Field Observations: N/A Good Fair: Surface Corrosion; Steps I	ntact and Solid; Minor Anchor Bolt Corrosion ther						
Underground Vault Observations: N/A 🔳 Good 🗌 Fair: Surface Corrosion	Poor: Corrosion Other						
Building Floor Slabs: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other							
Staircases/Stairwells: N/A Good Fair: Concrete Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other							
Building Walls: N/A Good Fair: Concrete Sealant Peeled or Cracked; Concrete Soft at Surface Poor: Exposed/Missing Aggregate; Exposed/Missing Re-bar Other							
Sump Pump: No Yes Type Model: Power (hp): Field Observations: Not Operational Poor Floor Drainage Other	TDH: Serial:						
* Cathodic Protection N/A							
Field Observations: Disconnected Other							
HVAC (HVA)							
Try Well HVAC							
Asset Size: Field Observations: Good N/A Old Ventilation Inoperable Makes Ventilation Duct Work Corroded Belts Loose or Torn Louv	Noise 🗌 Fans Vibrate ers 🗌 Roof Vents 🗌 Other						
* Wet Well HVAC N/A							
Asset Size:							
Field Observations: Good N/A Old Ventilation Inoperable Makes Noise Fans Vibrate Belts Loose or Torn Ventilation Duct Work Corroded Louvers Roof Vents Other							
Electrical Systems (ELE)							
* Control Panel	Phase Conversion System						
Asset Size (Volts) 240 Single phase Three Phase							
Manufacturer: Rockwell Automation Model: VFDs PowerFlex40 Serial Number:							
Power Supply Manufacturer: Model:	Туре:						



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Roth Professional Solutions

Section 3, ItemD.

Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked UL tited B Panel Chrowerd Holes Surge Protection Grounded Wring Labelled Panel Labelled Other Lighting Panel N/A Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Asset Size (Volts) Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Ligs Corroded Panel Labelled Out Inside Panel Exposed Wires Switch Gear Worn Ligs Corroded Panel Coronded Panel Coronded<th>Asset Class</th><th>CMMS Code Asset Year Cond. Perf. Utiliz. Field Observations/Comments Present Installed Rank Rank (%)</th>	Asset Class	CMMS Code Asset Year Cond. Perf. Utiliz. Field Observations/Comments Present Installed Rank Rank (%)
Lighting Panel N/A Asset Size [Volts] Manufacturer: Model: Serial Number: Field Observations: Good Panel Grounded Panel Grounded Panel Addited Other Model: Serial Number: Field Observations: Good Panel Grounded Oth/Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Generator Manual Transfer Model: Serial Number: Field Observations: Good Panel Grounded Other Model: Serial Number: Field Observations: Good Dust Inside Panel Cortacts Loose Cables Fatigued Checked Dust Inside Panel Cortacts Switch Gear Worn Lugs Corroded Panel Grounded Panel Grounded Other Main Soutch N/A Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Observations: Good Panel Corroded Other Model: Serial Number: Field Obser	Field Observations:	 Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Shop Drawings Available UL Listed Uncovered Holes Surge Protection Grounded Wiring Labelled Panel Labelled Other
Asset Size (Volts) Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Bits makers Labelled Panel Grounded Panel Labelled Opper * Main Switch N/A Asset Size (Volts) Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Abelled Other * Transfer Switch Cenerator Manual Transfer Asset Size (Volts) Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded	* Lighting Panel	N/A
Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Breakers tabelled Panel Corroded Old / Outdated / Obsolete Ontacts Loose Spare Spaces Available Main Switch N/A Image: Spare Spaces Available Panel Corroded Old / Outdated / Obsolete Asset Size (Volts) Manufacturer: Model: Serial Number: Field Observations: Good Image: Spare Space Wires Switch Gear Worn Lugs Corroded Panel Crounded Panel Labelled Other Image: Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Image: Switch Gear Worn Lugs Corroded Panel Grounded Asset Size (Volts) 240 VAC 90 AMP Single Phase Switch Gear Worn Lugs Corroded Cables Fatigued Checked Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Labelled Other Switch Gear Worn Lugs Corroded Panel Grounded Other <	Asset Size (Volts)	
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Breakers Labelled Panel Grounded Panel Labelled Other * Main Switch N/A	Manufacturer:	Model: Serial Number:
* Main Switch N/A Asset Size (Volts) Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Labelled Other Image: Contacts Loose Cables Fatigued Checked Panel Grounded * Transfer Switch Image: Contacts Loose Cables Fatigued Checked Cables Fatigued Checked Asset Size (Volts) 240 VAC 90 AMP Single Phase Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Labelled Other Other Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Labelled Other Other Switch Gear Worn Lugs Corroded Panel Grounded * Motor Control Center N/A Image: Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box N/A Image: Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box N/A Image: Switch Gear Worn <	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Bus and.or lugs corroded Spare Spaces Available Breakers Labelled Panel Grounded Panel Labelled Other
Asset Size (Volts) Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsoletc Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other * Transfer Switch Image: Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsoletc Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other * Motor Control Center N/A Image: Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other * Motor Control Center N/A Image: Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box N/A Image: Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other * Junction Box N/A Image: Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other * Junction Box N/A Image: Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Other * Miscellaneous Panel N/A Image: Contact	* Main Switch	N/A
Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolet Contacts Loose Cables Fatigued Checked Dust inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded * Transfer Switch Image: Serial Number: Generator Manual Transfer Asset Size (Volts) 240 VAC 90 AMP Single Phase Generator Manual Transfer Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded * Motor Control Center N/A Image: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolet Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Vi/A Image: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolet Contacts Loose Cables Fatigued Checked Ust Ins	Asset Size (Volts)	
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* Transfer Switch Image: Constant Summary Summar	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Other Other
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Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Other Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Motor Control Center N/A Dust Inside Panel Other Panel Labelled Other Motor Control Center N/A Nodel: Serial Number: Asset Size (Volts) Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Supposed Wires Switch Gear Worn Lugs Corroded Panel Labelled Other Supposed Wires Switch Gear Worn Lugs Corroded Panel Corrode Dust Inside Panel	Asset Size (Volts)	240 VAC 90 AMP Single Phase
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Asset Size (Volts) Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Asset Size Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked # Miscellaneous Panel 1 N/A	* Junction Box	N/A
Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Asset Size Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Panel Labelled Other Other Serial Number: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded	Asset Size (Volts)	
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* Miscellaneous Panel 1 N/A Image: Control of the state of th	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other Other Dust Inside Panel Other
Asset Size Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded	* Miscellaneous Pa	nel 1 N/A
Manufacturer: Model: Serial Number: Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded	Asset Size	
Field Observations: Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded	Manufacturer:	Model: Serial Number:
Panel Labelled Other	Field Observations:	Good Panel Corroded Old / Outdated / Obsolete Contacts Loose Cables Fatigued Checked Dust Inside Panel Exposed Wires Switch Gear Worn Lugs Corroded Panel Grounded Panel Labelled Other
LS # <u>11</u>

Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments				
Generator (GEN)											
* Emergency Generator											
* Emer. Gen. Connector		✓					Portable Off-Site				
Asset Size: M	lanufacturer:	_	Model:	_	Serial:		Generator Type:				
Field Observations: Good N/A Contacts Loose Cables Fatigued Checked Engine Fluids Low Poor Housekeeping Poor Accessibility Panel Grounded Panel Labelled Diesel Containment Other											
Instrumentation (INS)											
* Auto Dialer		✓					Sensaphone 1104				
Manufacturer:		Model:			Phone Nu	imber:					
Alarms: 🗌 High Level	Low Level	Generator	Running 🗌 F	Power Fail	Other	r					
* Float Controls	Back up	 ✓ 	2 Float								
* Bubbler Controls	-										
Manufacturer:		1	Model:		.1	1					
* Submersible Level Controls	,	 Image: A start of the start of					SCADAPack Controller 0-5 PSI				
Field Observations: Goo	od N/A B N/A B	ubbler Compress in Air System	sor Failing	Air Lines C	logged / Ful Controls C	ll of Moistu)bsolete	re Dither				
			SCADA ((SCA)							
Field Observations: Goo	od 📕 N/A 🗌	Obsolete	Other								
Variable Frequency Drive											
* Control Panel - VFD	N/A										
* Harmonic Filter	N/A										
* Output Filter	N/A										
Asset Size:	Manufactu	irer:		Model:			Observed RPM:				
Field Observations: Go	od 🗌 N/A 🗌	Makes Noise	Obsolete	Panel	Corroded /	Dusty / Lea	aky 🗌 Other				
			Motors (N	/ITR)							
* Motor 1		✓					Sithe Chopper Pumps				
Asset Size (HP) 5											
Manufacturer: Barnes		Model:		ç	Serial Numb	er:					
Field Observations: Go	Field Observations: 🗌 Good 🗌 N/A 🗌 Makes Noise 🗌 Vibrates 🗌 Shaft Bearing Noise 🗌 Opposite End Bearing Noise										
Overheating Needs Lubrication Over Lubricated Mount Failing Leaking Emergency Stop Button in Dry Well Inoperable Other Rads. Other Blockades											
* Motor 2		✓					Sithe Chopper Pumps				
Asset Size (HP): 5	Manufactu	ırer: Barnes		Model:		<u> </u>	Serial Number:				
Field Observations:		NA-1									
Good N/A Makes Noise Vibrates Shaft Bearing Noise Overheating Needs Lubrication Over Lubricated Mount Failing Leaking											
Emergency Stop Button in Dry Well Inoperable											



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LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Hor/Vert Centrifugal Pumps										
* Pump 1	N/A									
Manufacturer	Мос	del:			Serial Num	ber:				
Discharge Size (in)	Discharge Size (in) Suction Diameter				e (GPM)		TDH			
Priming Pump 🗌 🛛 N	lanufacturer:	М	odel:		Serial	No.:	Size (hp):			
Pressure Gauge 🗌 N	lanufacturer:		Pressure Rang	e:			PressureReading:			
Field Observations:	Good 🗌 N/A 🗍 Bearing Noise 🗌 N	Seals Leaking	VibratingEvidence of I	Shaft Sipe Strain	Deflection	Can ner	vitating 🗌 Belts Loose			
* Pump 2	N/A									
Discharge Size (in)	Suction D	iameter (in)		Pump Size	(GPM)		TDH			
Priming Pump Ma	anufacturer:	Мс	odel:		Serial N	lo.:	Size (hp):			
Pressure Gauge 🗌 Ma	anufacturer:		Pressure Range	:			PressureReading:			
Field Observations:	Good 🗌 N/A 🗌 Bearing Noise 🗌 M	Seals Leaking [ount Failing [Vibrating Evidence of P	Shaft D Shaft D Shaft D	Deflection	Cav	itating 🗌 Belts Loose			
		Sub	mersible Pun	nps (SUB)						
* Pump 1		~								
Manufacturer:	Barnes	Mod	el: Site Chop	ber	Seria	al:				
Discharge Size (in) 4"	Suction Dia	ameter (in)		Pump Size ((GPM) 10	0	TDH 5 HP			
Field Observations: G	ood 🗌 N/A 🗌 ther	Rail System Corroo	ded 🗌 Doe	s Not Seat V	Vell	Cables Co	rroded or Failing			
* Pump 2		✓								
Manufacturer:	Barnes	Mod	el: Site Chopp	er	Seria	al:				
Discharge Size (in) 4"	Suction Dia	ameter (in)		Pump Size (TDH 5 HP					
Field Observations: G	ood 🗌 N/A 🗌	Rail System Corroc	ded 🗌 Doe	s Not Seat V	Vell	Cables Co	rroded or Failing			
			Check Valv	es						
* Pump 1		✓								
Size (in): 4"	Manufa	acturer:		Mod	el:		Serial No:			
Field Observations:	Good N/A N/A N/A Not Seatin	/alve Operator Stur g C	ck 🗌 Valve heck Valve Not	Seat Leakin Operating	g	Flange	es Leaking nce of Pipe Strain			
* Pump 2		✓								
Size (in): 4"	Manufa	cturer:		Mode	el:		Serial No:			
Field Observations:	ood N/A V neck Valve Not Seating	alve Operator Stud	ck 🗌 Valve heck Valve Not (Seat Leaking Operating	ł	Flange	is Leaking Other			



LS # <mark>11</mark>

Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM

Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments				
		Piping and	d Valves Sucti	on Isolati	on Valve	es					
* Pump 1	N/A										
Size (in):	Manuf	acturer:		Mo	del:		Serial No:				
Field Observations:	Good N/A C Check Valve Not Seatin Other	Valve Operator S	tuck 🗌 Valve Check Valve No	e Seat Leakiı t Operating	ng	Flang	es Leaking nce of Pipe Strain				
* Pump 2	N/A										
Size (in):	Manuf	acturer:		Mo	del:		Serial No:				
Field Observations:	Good N/A C Check Valve Not Seatin	Valve Operator S	tuck 🗌 Valve Check Valve No	e Seat Leakiı t Operating	ng	Flang Flang Evide	es Leaking nce of Pipe Strain				
		Disch	arge Isolation	n Valves							
* Pump 1		v									
Size (in): 4"	Manufa	acturer:		Мос	lel:		Serial No:				
Field Observations:	Good N/A N/A Check Valve Not Seating	/alve Operator St	uck 🗌 Valve Check Valve Not	Seat Leakin Operating	g	Flange	 Flanges Leaking Evidence of Pipe Strain 				
* Pump 2	N/A										
Size (in):	Manuf	acturer:	• •	Moo	del:		Serial No:				
Field Observations:	Good N/A ' Check Valve Not Seating Other	Valve Operator St	check Valve Not	e Seat Leakir t Operating	ng	Flange	es Leaking nce of Pipe Strain				



Kronenwetter Well No. 2

Preliminary Overall Schedule: 7/18/23

1		Buildion	Start	FINISN	7/22	Septem	1 0/17	10/15	mber 1	12/10	January 1	2/4	March 1	•	3/31 May
1	Kronenwetter Well No. 2	298 days?	Wed 8/2/23	Sun 9/22/24	1/25	0/20	9/17	10/15	11/12	12/10		2/4	5/5		3/31
2	Long Lead Time Items	296 days?	Wed 8/2/23	Wed 9/18/24	P										
3	Light Fixtures	8 wks	Mon 8/14/23	Fri 10/6/23	8/14			10/6							
4	Control Panels	14 wks	Mon 8/14/23	Fri 11/17/23	8/14				11/17						
5	ATS	18 wks	Mon 8/14/23	Fri 12/15/23	8/14					12/1	5				
6	Panels, Transformers	20 wks	Mon 8/14/23	Fri 12/29/23	8/14						12/29			. 192	
7	Generator	50 wks	Mon 8/14/23	Fri 7/26/24	8/14										
8	Manholes and Associated Mate	eri 6 wks	Mon 8/14/23	Fri 9/22/23	8/14		9/22					1. 1. A.			
9	HVAC	8 wks	Mon 8/14/23	Fri 10/6/23	8/14			10/6							
10	Equalization Tanks	8 wks	Mon 8/14/23	Fri 10/6/23	8/14			10/6	2 ° 1 1 1	1.1.1					
11	Well Pump and Motor	10 wks	Mon 8/14/23	Fri 10/20/23	8/14			10/20							
12	Chemical Equipment	12 wks	Mon 8/14/23	Fri 11/3/23	8/14			1	1/3						
13	Valves	28 wks	Mon 8/14/23	Fri 2/23/24	8/14								2/23		
14	Filter System Equipment	44 wks	Mon 8/14/23	Fri 6/14/24	8/14										
15	Door Hardware	10 wks	Mon 8/14/23	Fri 10/20/23	8/14			10/20							
16	FRP Doors and Frames	18 wks	Mon 8/14/23	Fri 12/15/23	8/14					12/1	5	N			
17	Building Construction	250 days	Mon 8/28/23	Fri 8/9/24		Personal Association			n <mark>a)</mark> . Ny ika ina kara dia kara			#1110XXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXX		AND RAILING AND INC.	
18	Site Stripping/Rough Grading	2 days	Mon 8/28/23	Tue 8/29/23		8/28 👔 8/29		4							
19	Excavate Foundations	2 days	Wed 8/30/23	Thu 8/31/23		8/30 📲 8/31									
20	Site Utilities	1 wk	Mon 9/11/23	Fri 9/15/23	1942 .	9/11	9/15	1.54	•						
21	Footings/Foundations	2 wks	Mon 9/18/23	Fri 9/29/23		9/1	8 9/2	.9							
22	Underground R.I.	5 days	Mon 10/2/23	Fri 10/6/23		· · · · ·	10/2 📷	10/6		1.1.1.1					а., н. 25 . , .
23	Backfill Foundations	2 days	Mon 10/9/23	Tue 10/10/23			10/9	10/10							
24	Masonry	2 wks	Wed 10/11/23	Tue 10/24/23	12.12		10/11	10/24		NAME A		1 V			
25	Structural Steel	2 days	Mon 10/16/23	Tue 10/17/23			10/1	16 👖 10/17							
26	Interior Slab on Grade	4 days	Wed 10/25/23	Mon 10/30/23	1 A			10/25 💼 10/	/30			1		¹ 4	
27	Trusses	4 days	Tue 10/31/23	Fri 11/3/23				10/31 💼 1	1/3						
28	Roofing/Siding	1.5 wks	Mon 11/6/23	Wed 11/15/23	1.1	1.53	111	11/6	11/15	Cargo - P		1998 - 1 ⁹⁴	1. L. A.	1,000	
29	Insulation	3 days	Wed 11/15/23	Mon 11/20/23				11/1	15 📩 11/20).					
30	FRP Panels	1.5 wks	Mon 11/20/23	Wed 11/29/23				1	1/20 🗾 1	1/29				1.	
31	MEP Rough In/Process Piping	4 wks	Mon 6/3/24	Fri 6/28/24											
32	Painting/Coating	2 wks	Mon 7/1/24	Fri 7/12/24		· · · · · · · ·					Sec. 13		1	Sec. 2	
33	MEP Finishes	3 wks	Mon 7/1/24	Fri 7/19/24											
34	Knock Out Panel Masonry	4 days	Mon 7/1/24	Thu 7/4/24	1342	1 1 1 K					1.51		1		
35	Doors/Hardware	4 days	Fri 7/5/24	Wed 7/10/24											
36	Test & Balance	2 wks	Thu 7/11/24	Wed 7/24/24						1.1.1.1		1. N.	e da la R		
37	Misc. Specialties	1 wk	Mon 7/22/24	Fri 7/26/24											
38	Rough Grading	3 days	Fri 7/5/24	Tue 7/9/24		1.2.6			1216					. 1. 4	
39	Concrete Paving	1 wk	Wed 7/10/24	Tue 7/16/24											
40	Asphalt Paving	4 days	Wed 7/17/24	Mon 7/22/24											
41	Finish Grading	2 days	Tue 7/23/24	Wed 7/24/24											
42	Landscaping	5 days	Thu 7/25/24	Wed 7/31/24					14						
43	Generator	1 wk	Mon 7/29/24	Fri 8/2/24											
44	Punchlist	1 wk	Mon 8/5/24	Fri 8/9/24										1.11	

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								COP	ISTRUC Built Rigi	TION
28		5/26		July 1 6/23	1	7/21		Septe 8/18	mber 1	15
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PJ Kortens & Company, Inc.

Phone: (920) 730-9023 Fax: (920) 730 - 8931 1985 W Packard Street Appleton, WI 54914
 Quote

 No.:
 230178

 Date:
 07/12/2023

Kronenwetter Water Utility, Village of 1582 Kronenwetter Drive Kronenwetter, WI 54455 USA Prepared for: Mark Mackey Phone: (715) 693-5732

Total:

\$18,650.00

Scada Computer Replacement

Scope:

P.J. Kortens & Co respectfully submits this quotation to replace the SCADA Computer. The following will be provided as part of this quote:

- A new Dell computer with Windows 10 and upgrades of the following software's:

- -Wonderware SCADA software,
- XL reporter software upgrade
- -Win-911 alarm software. See note below !!
- Grandstream modem
- Installation and startup of SCADA computer

Labor includes upgrading software for the above listed applications

Note: The Win-911 software is currently on support. At this time the Win-911 software upgrade would be covered under this support.

Quantity	Part Number	Description					
1	Misc. Materials	Dell computer, monitor, mouse , key board					
1	UCM6202 IP	GRANDSTREAM IP PBX 2 FXS PORTS 2 FXO PORTS WIN -911 Modem (Interactive)					
1	Misc. Materials	Wonderware software upgrade					
1	Misc. Materials	XL Reporter software upgrade					
1.00	Labor - Programming	Programming Labor					
225	Mileage Expenses	Mileage					
		Your Price: \$18,650.00					

Prices are firm until 8/9/2023

Terms: Net 15

Prepared by: Mark Hoff, mark.hoff@pjkco.com	Date:
Accepted by: Tym Marey, asminis	trator Date: 7/12/2023

Disclaimer

Terms and Conditions

1. All prices quoted are valid for 30 days. Please fax signed quote to 920-730-8931or email to info@pjkco.com so that your order can be placed. Any sales tax due will be invoiced in addition to the quoted price.

2. PJKortens & Company, Inc. (hereafter named as "Seller") agrees to perform the deliveries and services as stated in the 'Scope of Work' attached to this agreement.

Unless otherwise specified in Seller's quotation, the Purchaser shall pay the purchase price (including the price of goods and fees for services) in full within thirty (30) days after the services are rendered or the goods are shipped, unless otherwise stated in the proposal. Hardware invoiced FOB shipping from factory, with verification of receipt for assembly or installation.

3. All invoices from the Seller unpaid after the due date shall bear interest at the rate of one and one-half percent per month. The Seller may, at their option, cease to perform services or deliver goods for the Purchaser upon the Purchaser's failure to make timely payment. In the event collection of any amounts due hereunder is referred to an attorney by the Seller, Purchaser shall bear all costs of collection including, but not limited to, Seller's reasonable attorney's fees.

4. Warranty Period: Seller will warrant errors and omissions in the performance of the Scope of Work for twelve (12) months after acceptance of the work. For the purpose of start of the Warranty Period, acceptance of the work shall occur on the earliest of the following events:

(a) The date of first use by the Purchaser or first use for the benefit of the Purchaser, whether such use is partial or complete;

(b) The date of completion of the start-up or commissioning;

(c) Thirty (30) days after the Seller has delivered to the Purchaser the products under contract, or three (3) months after Seller has been caused to stop work for any reason beyond Seller's control.

In the event Purchaser believes Seller owes a warranty obligation applicable to the Scope of Work, or has otherwise failed to comply with any other contract obligation, it must notify Seller in writing within 20 days of its discovery of such obligation and in no event later than 90 days after completion of the applicable services or deliverables. If Seller owes a warranty obligation, it will promptly commence to remedy and cure such default upon receipt of such notice from Purchaser at Seller's own cost and expense or, at Seller's option, will refund to Purchaser the portion of the compensation paid for any defective services or deliverables. Such performance by Seller is Purchaser's sole and exclusive remedy in the event of a warranty obligation of Seller or any other failure of Seller to comply with its contract obligations. SELLER MAKES NO OTHER WARRANTIES, EXPRESS OR IMPLIED, AND ANY OTHER WARRANTIES (INCLUDING WITHOUT LIMITATION THE IMPLIED WARRANTIES OF MERCHANTABILITY, TITLE/AGAINST INFRINGEMENT AND FITNESS FOR A PARTICULAR PURPOSE) ARE EXPRESSLY DISCLAIMED BY SELLER TO THE FULLEST EXTENT PERMITTED BY LAW. All parts or products not manufactured by Seller will be covered only by the express warranty provided by the manufacturer. No warranty applies to the extent of damage or wear caused by misuse, normal wear and tear, negligence, accident, corrosion, modification by Purchaser, faulty installation, loss of product, or tampering in a manner to impair normal operation of the equipment.

5. With respect to products supplied by Seller that are covered by a manufacturer's warranty, Seller's sole responsibility shall be to replace, or at Seller's option repair, any equipment or parts thereof which are found to be defective in material or workmanship to the extent Seller is able to obtain such repair or replacement parts from the manufacturer. Seller shall provide such replacement parts FOB at manufacture's shipping point, in keeping with the manufacturer's warranty policy, and Seller is not responsible for the cost of labor or expenses associated with the replacement or repair of any such parts. Under no circumstances will Seller extend or modify a manufacturer's warranty terms and/or conditions, or accept responsibility for consequential or speculative damages as a result of the products or services supplied by this agreement.

6. Intellectual Property: Seller retains all rights, title and interest in its services and deliverables, including patents and copyrights; however, upon payment of the agreed compensation to Seller, Purchaser will be deemed to have been granted a non-exclusive, non-transferable, royalty-free, perpetual license to use the services and deliverables for the purposes contemplated in the proposal, except that third-party "shrink-wrapped" software or "off-the-shelf" hardware provided through Seller will be subject to Purchaser's compliance, at its own costs, with all applicable manufacturer licensing requirements. Purchaser may not sell, sublicense, assign or transfer its license to the services and deliverables provided by Seller without the prior written consent of Seller, nor may Purchaser reverse engineer or make derivative works from the services or deliverables.

7. If Purchaser is the "end user" of the work, subject to the other terms and conditions set forth herein the Seller grants to Purchaser a non-transferable, non-exclusive, license to use the software for Purchaser's internal purpose only. The Purchaser shall not sell, license, disclose, give away, assign or transfer the software or any interest therein to anyone. The Purchaser, however, may engage other persons or firms to modify or add to the Systems Integrator's Software, in which case such other persons or firms may modify or add to the software for no purpose other than for Purchaser's internal benefit and, shall first execute and deliver to the Seller a confidentiality agreement indicating they shall not otherwise use, disclose, give away or transfer any interest in the software to anyone. If the Purchaser makes additions or modifications to the Software, Purchaser will own such additions and modifications, including all intellectual property rights in the additions and modifications.

8. Purchaser agrees that it will not, either while work is being performed by Seller pursuant to these terms and conditions, or within two (2) years thereafter; (a) hire any employee of Seller: (b) solicit or encourage any employee to leave the employ of Seller; or (c) hire any person who has left the employ of Seller within two (2) years after the termination of such person's employment with Seller. Seller offers the option to hire any current or previous Seller's employee from the date of this contract up to 24 months after the project or assignment is complete for a fee of 50% of that staff member's total pay, wages, and/or salary with Purchaser (however described by Purchaser) for a period of (5) five years, per employee, which fee the parties agree to as liquidated damages and as a reasonable estimate of the economic harm Seller will suffer from the loss of its employees. This fee represents the cost of replacement of the Seller employee. In addition, Purchaser shall give Seller fifteen (15) business days prior written notice of intent to hire any Seller employee.

9. Limit of Liability: In no event shall Seller be liable for more than the cost of the products sold contract or services provided. In no event shall Seller be liable for any damages resulting from loss of data, loss of profits, cost of cover or other special, incidental, consequential or indirect damages arising in any way out of the agreement.

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10. Termination: If Purchaser fails to comply with its obligations under the proposal or these Terms and Conditions (including without limitation the full and timely payment to Seller), Seller may provide written notice of such default to Purchaser and may thereafter suspend further performance until such default is cured by Purchaser. When such default is cured by Purchaser, the amount to be paid for the Scope of Work will be equitably increased to account for Seller's damages arising from such suspension (including without limitation demobilization and remobilization expenses and increased costs of performance) and Seller the time for Seller to complete the Scope of Work will be equitably extended to account for such suspension. If Purchaser fails to cure such default within 30 days of its receipt of such notice from Seller, Seller may terminate its agreement with Purchaser by providing written notice to Purchaser and in such an event, Purchaser will pay Seller for all portions of the Scope of Work performed (in whole or in part) through the date of such termination, Seller's demobilization expenses and other reasonable termination costs, the amount of expected overhead and profit Seller would have earned on the cancelled portions of the Scope of Work if not for Purchaser's default, and any collection costs incurred by Seller in obtaining payment for its services and deliverables from Purchaser. 11. Safety items may exist that are not identified or corrected. It is the Purchaser's responsibility to do a thorough safety assessment of their facilities.

12. During the course of the project, either Purchaser or Seller may request changes to the Scope of the Work. Such changes will be effective if the other party agrees to the change in writing. If the agreed change results in greater or lesser cost, Seller's compensation for the work will be adjusted accordingly.

13. Purchaser acknowledges that the services and deliverables may be subject to export and use restrictions under applicable law, include Export Administration Regulations maintained by the United States Department of Commerce. Purchaser agrees to comply with all such requirements and to hold Seller harmless from any violations of such requirements.

14. In the event that performance of the services and/or delivery to Purchaser of the deliverables is delayed by circumstances beyond the reasonable control of Seller (including without limitation changes to the scope of work, delays by Purchaser in providing information to Seller, fire, natural disasters, civil disturbances, acts of governmental authorities, labor disputes, unavailability of materials or shipping delays), Seller will promptly notify Purchaser of such circumstances in writing and Seller will be granted an equitable extension of the time to meet its obligations under the agreement.

15. Seller is an independent contractor and will have sole charge over, and be solely responsible for, (a) the payment of its employees and subcontractors and (b) the means, methods, techniques and sequences used in the performance of the services and the creation of its deliverables. Both Seller and Purchaser assume that the industrial exemption applies to all services under this agreement, and Purchaser acknowledges that individuals not licensed as professional engineers may execute some or all of the services and create some or all of the deliverables.

16. In the event Seller and Purchaser cannot resolve any claim or dispute between them arising out of or related to the proposal or the scope of work through direct negotiations, such dispute shall be subject to arbitration in accordance with the Commercial Arbitration Rules of the American Arbitration Association. Such arbitration proceedings will be held in Wisconsin before a single arbitrator with experience in resolving disputes arising from information technology services. The prevailing party (as determined by the arbitrator) will be entitled to recover from the other party all costs incurred in resolving the dispute, including reasonable attorneys' and expert fees and the costs of arbitration. The arbitrator's award shall be final and may be entered as a judgment in any court with jurisdiction.

17. The agreement and these Terms and Conditions will be governed by the laws of Wisconsin and of the United States of America (including the Federal Arbitration Act, 9 U.S.C. § 1, et seq. with respect to the parties' agreement to arbitrate any dispute arising out of or related to the proposal or the scope of work), without regard to rules governing choice or conflict of laws. Purchaser and Seller agree that the agreement is predominately for the performance of services, not for the sale of goods, and further agree that the United Nations Convention on Contracts for the International Sale of Goods will not apply to their agreement.

18. Neither Purchaser nor Seller may assign its respective rights and obligations under their agreement without the written consent of the other party. However, Seller may subcontract or delegate its work obligations to other persons or entities, but will nonetheless be responsible to Purchaser for the performance of the work as required by the proposal. Both Purchaser and Seller agree that there are no third-party beneficiaries to their agreement.

19. If any term of the agreement or these Terms and Conditions is found to be unenforceable, the remaining terms will remain in effect. The failure of either Seller or Purchaser to exercise any rights under their agreement will not be deemed a waiver of such right except as agreed in writing or as otherwise set forth in these Terms and Conditions.

20. These Terms and Conditions, along with the attached Services Agreement and Scope of Work, constitute the entire integrated agreement between Seller and Purchaser for the services, deliverables and project. These terms supersede all previous and contemporaneous agreements, proposals and representations, written or oral, concerning such matters. Any additional, conflicting or inconsistent Purchaser terms (whether set forth in a request for proposals, purchase order or acknowledgement or in any other document) are expressly rejected by Seller and are not a part of this agreement.



UTILITY COMMITTEE MEETING MINUTES

July 06, 2023 at 5:45 PM

Kronenwetter Municipal Center - 1582 Kronenwetter Drive Board Room (Lower Level)

1. CALL MEETING TO ORDER @ 5:45pm

- A. Pledge of Allegiance
- B. Roll Call PRESENT
 Craig Mortensen
 Vice-Chair Jim Buck
 Sean Dumais
 Chair Alex Vedvik-Appeared via phone then in person @ 7PM

2. PUBLIC COMMENT

No public comment.

3. APPROVAL OF MINUTES

- Discussion and Approval: 2023 05 02 UC Minutes
 Approved with Modification Motion made by Mortensen, Seconded by Vice-Chair Buck. Voting
 Yea: Mortensen, Vice-Chair Buck, Dumais, Chair Vedvik
- D. Discussion and Approval: 2023 06 06 UC Minutes
 Approved with Modifications Motion made by Mortensen, Seconded by Vice-Chair Buck. Voting
 Yea: Mortensen, Vice-Chair Buck, Dumais, Chair Vedvik

4. REPORTS AND DISCUSSIONS

E. Treasurer's Report-Presented by Lisa Kerstner

5. OLD BUSINESS

- F. Discussion: Lift Station Update Lift Station Update given by Pete Wegner. Staff met with Robert Roth on information needed to complete the study. Robert Roth will be in person at the Aug 1 UC meeting.
- G. Discussion: Update on Water/Sewer Rate Study
 Presented by Lisa Kerstner. Brian from Ehlers on the phone to give an overview of Phase 1 and will present the Phase 1 analysis at the Aug 1st UC meeting.
- H. Discussion: Update on Water FiltrationUpdate presented by Ken Ligman of Becher and Hoppe in person.
- Discussion: Update Safe Drinking Water Loan Program Given by Ken Ligman Becher Hoppe. Village needs to decide what the final loan amount will be. Joint meeting with UC, APC and VB, with a possible date of July 24, 2023.

J. Discussion & Possible Approval: Short-Term Financing for Water Filtration Project Given by Lisa Kerstner. Also, Brian from Ehlers via phone.

6. NEW BUSINESS

K. Discussion and Action: Recommendation to Appoint Two Members of Utility Committee to the Ad Hoc Committee Regarding Committee Structure Craig Mortensen volunteered. Sean Dumais and Alex Vedvik also volunteered; one will be the alternate. Motion made by Mortensen, Seconded by Vice-Chair Buck. Voting Yea: Mortensen, Vice-Chair Buck, Dumais, Chair Vedvik

7. CONSIDERATION OF ITEMS FOR FUTURE AGENDA

-Safe Drinking Water Loan Program -Short-Term Financing.

8. NEXT MEETING: August 01, 2023

9. ADJOURNMENT

At 7:17pm, Motion made by Chair Vedvik, Seconded by Dumais. Voting Yea: Mortensen, Vice-Chair Buck, Dumais, Chair Vedvik