LS # 9_____

Roth Professional Solutions

LIFT STATION CONDITION ASSESSMENT FORM

Assessment Date: 25 April 2023

Location: Parcel # 14527071	1210988, W Road	d, Mosinee, Munici	pality: Village	of Kronenwetter	LS Type: Duplex Submersible					
Engineer: Roth Professional Solutions Technical & Equipment Assistance: B&M Technical Services										
House Keeping: Good N/A Poor Lighting Tripping Hazards Present No Fall Protection Exposure to Raw Wastewater in Dry Well Sump Pump Inoperable Electric Space Heater Inoperable Potential for Shock or Electrocution Other										
Health and Safety Issues:										
Other Observations: 30' D / '03 / Barnes / Ebaro										
Asset Class	Asset Present	Year Con- Installed Ran		Field Observations/C	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 Observ	vations .									
Access Driveway Details:	Gravel or	aggregate basecourse c	only 🗌 Cond	crete Pavement 🔳 Bi	ituminous Pavement					
Parking Details: Non	ne Gravel	Paved								
Fence Details: Chai	n Link Other	Fencing Height (ft):	!	Fencing Length (ft):						
Gate Type: Singl	le Double									
Traffic: Oth	er	Site too Close to Traffi	C							
Grounding System Present Grounding Rings Grounding Rods Details:										
If applicable, approximate p	parking area:									
If applicable, approximate s	site area:									
Other Notes:	/-l \/ (\(\bar{\bar{\bar{\bar{\bar{\bar{\bar{	D [] D D		/ 4II \ / = l						
MidRail Brackets OK; \		_								
Gauge Turned; Valve Vault Electrical Corner Junction Cover Off Seal Conduit Runs										





Asset Class	CMMS Code	Asset Present	Year Installed	Cond. Rank	Perf. Rank	Utiliz. (%)	Field Observations/Comments			
Structure and Wetwell (PST)										
* Building		~								
Building Structures: None Concrete Walls Concrete Floor Doors Total Floor Area: Plan Floor Area:										
Field Observations: Good	d N/A R	oof Degraded	Doors and Se	curity Failir	ng 🗆 N	leeds Paint				
Cracks on the Wall Cracks on the Floor Other										
* Odor Control		✓								
Odor Details: Ven	t Pipe	Other	Details							
Field Observations: Operational and in use On site, but not required Does not operate, needs repair Other										
* Crane/Hoist		✓					Portable Off-Site			
Crane Details: Man	ufacturer:		Model:		Sei	rial Number	:			
Field Observations: Goo	od operating condition	n Does r	not operate, requ	iires repair	Mou	nting Hard	ware intact			
Oth	er									
* Bar Screen or Com minuter	N/A									
System Description: N	lo Bar Screen	Manually Raked	Bar Screen	Mechanic	cally Raked	Bar Screen	Screen Bypass Provided?			
Mechanical Bar Screens:	Manufacturer:		Model:	Seri	al Number:		Power Requirements (hp):			
Odor Details: N/A		frequent cleanin	g Shor	t repsonse t	ime 🗌	Odor fly n	uisance Screens not in use			
Othe										
* Flow Meter	N/A									
Type: N/A	A Type:	М	anufacturer:		Model:		Serial Number:			
Flow Meter Field Observation	ons: Operation	al		L	ocation					
	Other									
* Wet Well		~								
Walls: Concre	te Steel	Fiberglass								
Slab/Cover: 🔳 Reinfor	rced Concrete	Steel Pu	mps, motors and	d electric p	anel are m	nounted on	cover/slab directly over wet well			
Pump Control System: 🔳 1	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 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	·· Concrete Seels	nt Peeled or Crac	ked: Concre	ite Soft at Si	ırface				
vec vven vvan Observations.			te; Exposed/Missi		Other	ui luce				
Slab/Cover Observations:	Good Fair:	Concrete or Alun	ninum Grate Sligh	ntly Corrode	d But Safe					
Poor: Concrete Aggregate Missing/Exposed; Grate Corroded or Warped; Debris Over Platform Other										





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: 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 Corrosi	on But Operates	Properly; N	leeds Seala	nt Around C	Opening				
	Poor: Any One Vent Does Not Operate; Corroded or Broken Off at Wall Other										
* Dry Well Valve Vault											
Location Type:	None Un	derground pump	vault with acces	s tube and	ladder	Locat	ed below grade inside building				
Lighting:	Yes No										
Cathodic Protection	Not Required	None	Yes								
Access Tube and Ladder Field	Observations: Poor: Corroded or	N/A Goo Broken Steps; Co			-	ntact and So	olid; Minor Anchor Bolt Corrosion				
Underground Vault Observation	ons:	□ N/A □ Goo	d	face Corros	ion 🗀	Poor: Corr	osion Other				
D. Haller Clarks	/A = C1 =										
_	/A Good Goor: Exposed/Missing	Fair: Concrete Sea g Aggregate; Expo				at Surrace					
Staircases/Stairwells:	N/A Good	Fair: Concrete	Cracked; Concr	ete Soft at S	Surface						
	Poor: Exposed/Mi	 ssing Aggregate; E	xposed/Missing I	Re-bar	Other						
Building Walls:	N/A Good	Fair: Concrete	Sealant Peeled	or Cracked;	Concrete S	oft at Surfa	ce				
	Poor: Exposed/Mis	ssing Aggregate; E	xposed/Missing	Re-bar	Other						
Sump Pump: No Ye	Sump Pump: No Yes Type Model: Power (hp): TDH: Serial:										
Field Observations: No	t Operational	Poor Floor Drain	age O	ther							
* Cathodic Protection	N/A										
Field Observations: Di	sconnected (Other									
			HVAC (HVA	N)							
* Dry Well HVAC	N/A										
Asset Size:											
Field Observations: Go	od N/A	Old V	entilation Inope	rable [Makes	Noise	Fans Vibrate				
Ve	ntilation Duct Work	Corroded	Belts Loose or	Torn	Louv	/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) 240 VAC		Single	phase	Three Pha	ase						
Manufacturer: US Filte	r	Model: Sieme	ens Sentron	Serial Nu	mber:						
Power Supply Manufactu	irer:		Model:				Туре:				





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	Outdated / Obs Shop Dra Wiring Labelle	wings Availa		UL Listed	Cables Fatigued Checked Uncovered Holes her
* Lighting Panel	N/A						
Asset Size (Volts)				·			
Manufacturer:		Model:		Serial Nun	nber:		
Field Observations:	Good Panel Corror Dust Inside Panel Breakers Labelled	ded Old / O Exposed Wires Panel Grounded	Outdated / Obso Switch Ge Panel La	ear Worn	Contacts Lo Bus ar Other	oose id.or lugs co	Cables Fatigued Checked orroded Spare Spaces Available
* Main Switch		✓					
Asset Size (Volts) 24	40 VAC 10						
Manufacturer:	Siemens	Model: Sentron	1	Serial Nun	nber: N/A		
Field Observations:	Good Panel Corro Dust Inside Panel Panel Labelled	ded Old / 0 Exposed Wires Other	Outdated / Obso		Contacts Logs C		Cables Fatigued Checked Panel Grounded
* Transfer Switch		~					Manual
Asset Size (Volts	240 Manual Gen Rec			1			
Manufacturer:		Model:		Serial Nur	mber:		
Field Observations:	Good Panel Corro	oded Old / 0 Exposed Wires Other	Outdated / Obs	olete Gear Worn	Contacts L	oose Corroded	Cables Fatigued Checked Panel Grounded
* Motor Control	Center	✓					
Asset Size (Volts)	36x48x12	1					
Manufacturer:	Hoffman	Model: FP1		Serial Num	nber: 400	019	
Field Observations:	Good Panel Corro Dust Inside Panel Other	ded Old / C Exposed Wires	Outdated / Obsc	olete 🗌 ear Worn	Contacts Lo	oose orroded [Cables Fatigued Checked Panel Labelled
* Junction Box		✓					
Asset Size (Volts)	36x48x12						
Manufacturer:		Model:		Serial Num	nber:		
Field Observations:	Good Panel Corro Dust Inside Panel Panel Labelled	ded Old / C Exposed Wires Other	Outdated / Obsc		Contacts Lo	oose orroded [Cables Fatigued Checked Panel Grounded
* Miscellaneous Pa	anel 1 N/A						
Asset Size							
Manufacturer:		Model:		Serial Nur	mber:		
Field Observations:	Good Panel Corro	ded Old / 0 Exposed Wires Other	Outdated / Obso		Contacts L		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										
* Emer. Gen. Connector		✓	Portable							
Asset Size: N	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		✓								
Manufacturer: Dialog Elite Model: Antx Phone Number: 715-359-5503										
Alarms: High Leve										
* Float Controls	Back Up	~	2 Floats							
* Bubbler Controls		✓								
Manufacturer:	Mercoid	,	Model: MPC	Junior 0-5	PSI					
* Submersible Level Control		✓								
	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	rer:		Model:			Observed RPM:			
Field Observations: Go	od N/A	Makes Noise	Obsolete	Panel	Corroded/	Dusty / Lea	aky 🗌 Other			
			Motors (N	/ITR)						
* 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	rer: EBARA		Model:	1	I	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										





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 [Diameter (in)		Pump Siz	e (GPM)		TDH				
Priming Pump Ma	anufacturer:	Ν	lodel:		Serial	No.:	Size (hp):				
Pressure Gauge Ma	anufacturer:		Pressure Rang	ge:			PressureReading:				
Field Observations: Good N/A Seals Leaking Vibrating Shaft Deflection Cavitating Belts Loose Bearing Noise Mount Failing Evidence of Pipe Strain Other							vitating Belts Loose				
* Pump 2	N/A										
Discharge Size (in)	Suction D	iameter (in)		Pump Size	e (GPM)		TDH				
Priming Pump Mai	nufacturer:	Me	odel:		Serial N	No.:	Size (hp):				
Pressure Gauge Mai	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											
		Sub	mersible Pu	mps (SUB)							
* Pump 1		✓									
Manufacturer:	<u>, </u>	Mod	lel:		Seri	al:					
Discharge Size (in) 6"	Suction Dia	ameter (in)		Pump Size	(GPM) 13	5 +/-	TDH 3-5 HP				
Field Observations: Go		Rail System Corro	ded 🗌 Doe	es Not Seat \	Well	Cables Co	orroded or Failing				
* Pump 2		V									
Manufacturer:		Mod	del:		Seri	al:					
Discharge Size (in) 6"	Suction Dia	ameter (in)		Pump Size	(GPM)		TDH				
Field Observations: Go	od 🗌 N/A 📗 I her	Rail System Corro	ded 🗌 Doe	es Not Seat \	Well	Cables Co	orroded or Failing				
Check Valves											
* Pump 1		~									
Size (in): 4"	Manufa	acturer:		Mod	lel:		Serial No:				
☐ ci	Field Observations: Good N/A Valve Operator Stuck Valve Seat Leaking Flanges Leaking Flanges Leaking Evidence of Pipe Strain Other										
* Pump 2		✓									
Size (in): 4"	Manufa	cturer:		Mod	el:		Serial No:				
Field Observations: Goo	od N/A Veck Valve Not Seating	alve Operator Stu	ck	Seat Leakin Operating	g		es Leaking Other				





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):	Manu	acturer:		Мс	del:		Serial No:			
Field Observations:	Good N/A Check Valve Not Seatin	Valve Operator St	uck 🗌 Valv Check Valve No	e Seat Leaki t Operating			es Leaking nce of Pipe Strain			
* Pump 2	N/A									
Size (in):	Manut	acturer:		Мо	del:		Serial No:			
Field Observations:	Good N/A Check Valve Not Seatin Other	Valve Operator St	uck	e Seat Leaki t Operating			es Leaking nce of Pipe Strain			
		Disch	arge Isolatior	n Valves						
* Pump 1		✓								
Size (in): 4"	Manuf	acturer:		Mo	del:		Serial No:			
Field Observations:	Good N/A Check Valve Not Seating Other	/alve Operator Stu	ick Valve Check Valve Not	e Seat Leakii COperating	ng	_	es Leaking nce of Pipe Strain			
* Pump 2	N/A									
Size (in):	Manuf	acturer:		Мо	del:		Serial No:			
Field Observations:	Good N/A Check Valve Not Seatin Other	Valve Operator Sti	uck	e Seat Leaki t Operating			es Leaking nce of Pipe Strain			

