STATE OF UTAH

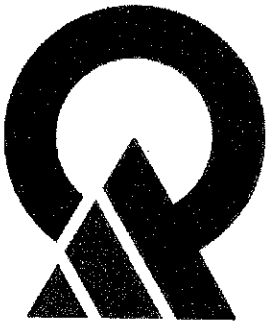
MUNICIPAL WASTEWATER PLANNING PROGRAM

SELF-ASSESSMENT REPORT

FOR

HYRUM

2016



UTAH DEPARTMENT *of*
ENVIRONMENTAL QUALITY
WATER QUALITY

Municipal Wastewater Planning Program (MWPP)
Financial Evaluation Section for 2016

Owner Name: HYRUM

Name and Title of Contact Person:

KEVIN MAUGHAN

MANAGER

Phone: 435-881-0562

E-mail: kmaughan@hyrumcity.com

SUBMIT BY APRIL 15, 2017

Electronic submission: http://deq.utah.gov/ProgramsServices/services/submissions/index.htm

or

Mail to: MWPP - Department of Environmental Quality
Division of Water Quality
195 North 1950 West
P.O. Box 144870
Salt Lake City, Utah 84114-4870
Phone: (801) 536-4300

NOTE: This questionnaire has been compiled for your benefit by a state sponsored task force comprised of representatives of local government and service districts. It is designed to assist you in making an evaluation of your wastewater system and financial planning. If you received financial assistance from the Water Quality Board, annual submission of this report is a condition of that assistance. Please answer questions as accurately as possible to give you the best evaluation of your facility. If you need assistance please call John Mackey, Utah Division of Water Quality: (801) 536-4300.

I. Definitions: The following terms and definitions may help you complete the worksheets and questionnaire:

User Charge (UC) - A fee established for one or more class(es) of users of the wastewater collection and treatment facilities that generate revenues to pay for costs of the system.

Operation and Maintenance Expense - Expenditures incurred for materials, labor, utilities, and other items necessary for managing and maintaining the facility to achieve or maintain the capacity and performance for which it was designed and constructed.

Repair and Replacement Cost - Expenditures incurred during the useful life of the treatment works for obtaining and installing equipment, accessories, and/or appurtenances necessary to maintain the existing capacity and the performance for which the facility was designed and constructed.

Capital Needs - Cost to construct, upgrade or improve the facility.

Capital Improvement Reserve Account - A reserve established to accumulate funds for construction and/or replacement of treatment facilities, collection lines or other capital improvement needs.

Reserve for Debt Service - A reserve for bond repayment as may be defined in accordance with terms of a bond indenture.

Current Debt Service - Interest and principal costs for debt payable this year.

Repair and Replacement Sinking Fund - A fund to accumulate funds for repairs and maintenance to fixed assets not normally included in operation expenses and for replacement costs (defined above).

Part I: OPERATION AND MAINTENANCE

Complete the following table:

Question	Points Earned	Total
Are revenues sufficient to cover operation, maintenance, and repair & replacement (OM&R) costs ***at this time***?	YES = 0 points NO = 25 points	0
Are the projected revenues sufficient to cover operation, maintenance, and repair & replacement (OM&R) costs for the ***next five years***?	YES = 0 points NO = 25 points	0
Does the facility have sufficient staff to ensure proper OM&R?	YES = 0 points NO = 25 points	0
Has a dedicated sinking fund been established to provide for repair & replacement costs?	YES = 0 points NO = 25 points	0
Is the repair & replacement sinking fund adequate to meet anticipated needs?	YES = 0 points NO = 25 points	0
What was the average User Charge fee for 2016?	$ 42.13 per month	
	TOTAL PART I =	0

Part II: CAPITAL IMPROVEMENTS

Complete the following table:

Question	Points Earned	Total
Are present revenues collected sufficient to cover all costs and provide funding for capital improvements?	YES = 0 points NO = 25 points	0
Are projected funding sources sufficient to cover all projected capital improvement costs for the next ***next five years***?	YES = 0 points NO = 25 points	0
Are projected funding sources sufficient to cover all projected capital improvement costs for the next ***next ten years***?	YES = 0 points NO = 25 points	0
Are projected funding sources sufficient to cover all projected capital improvement costs for the next ***next twenty years?***	YES = 0 points NO = 25 points	25
Has a dedicated sinking fund been established to provide for future capital improvements?	YES = 0 points NO = 25 points	0
	TOTAL PART II =	25

Part III: GENERAL QUESTIONS

Complete the following table:

Question	Points Earned	Total
Is the wastewater treatment fund a separate enterprise fund/account or district?	YES = 0 points NO = 25 points	0
Are you collecting 95% or more of your sewer billings?	YES = 0 points NO = 25 points	0
Is there a review, at least annually, of user fees?	YES = 0 points NO = 25 points	0
Are bond reserve requirements being met if applicable?	YES = 0 points NO = 25 points	0
	TOTAL PART III =	0

Part IV: PROJECTED NEEDS

Estimate as best you can the following:

	2017	2018	2019	2020	2021
Cost of projected capital improvements (in thousands)	400000	400000	400000		

Point Summation

Fill in the point totals from Parts I through III in the blanks provided in the Points column. Add the numbers to determine the MWPP point total that reflects your present financial position for meeting your wastewater needs.

Part	Points
I	0
II	25
III	0
Total	25

Municipal Wastewater Planning Program (MWPP)
Collection System Section

Owner Name: HYRUM

Name and Title of Contact Person:

KEVIN MAUGHAN

MANAGER

Phone: 435-881-0562

E-mail: kmaughan@hyrumcity.com

SUBMIT BY APRIL 15, 2017

Electronic submission: http://deq.utah.gov/ProgramsServices/services/submissions/index.htm

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Mail to: MWPP - Department of Environmental Quality
Division of Water Quality
195 North 1950 West
P.O. Box 144870
Salt Lake City, Utah 84114-4870
Phone: (801) 536-4300

Form completed by:

KEVIN MAUGHAN

May Receive Continuing Education Units (CEUs)

Part I: SYSTEM AGE

A. What year was your collection system first constructed (approximately)?

Year _____

B. What is the oldest part of your present system?

Oldest part _____ years

Part II: BYPASSES

A. Please complete the following table:

Question	Number	Points Earned	Total Points
How many days last year was there a bypass, overflow or basement flooding by untreated wastewater in the system due to rain or snowmelt?		0 times = 0 points 1 time = 5 points 2 times = 10 points 3 times = 15 points 4 times = 20 points 5 or more = 25 points	0
How many days last year was there a bypass, overflow or basement flooding by untreated wastewater due to equipment failure? (except plugged laterals)		0 times = 0 points 1 time = 5 points 2 times = 10 points 3 times = 15 points 4 times = 20 points 5 or more = 25 points	0
		TOTAL PART II =	0

B. The Utah Sewer Management Program defines two classes of sanitary sewer overflows (SSOs). Below include the number of SSOs that occurred in 2016.

Class 1- a Significant SSO means a SSO or backup that is not caused by a private lateral obstruction or problem that:

(a) affects more than five private structures;
(b) affects one or more public, commercial or industrial structure(s);
(c) may result in a public health risk to the general public;
(d) has a spill volume that exceeds 5,000 gallons, excluding those in single private structures; or
(e) discharges to Waters of the state.

Part II: BYPASSES (cont.)

Class 2 – a Non-Significant SSO means a SSO or backup that is not caused by a private lateral obstruction or problem that does not meet the Class 1 SSO criteria.

Number of Class 1 SSOs in Calendar year 2016 0

Number of Class 2 SSOs in Calendar year 2016 0

C. Please indicate what caused the SSO(s) in B. If needed attach the additional information to this report.

N/A

D. Please specify whether the SSOs were caused by contract or tributary community, etc.

N/A

Part III: NEW DEVELOPMENT

A. Please complete the following table:

Question	Points Earned	Total Points
Has an industry or other development moved into the community or expanded production in the past two years, such that either flow or wastewater loadings to the sewerage system were significantly increased (10 - 20%)?	No = 0 points Yes = 10 points	0
Are there any major new developments (industrial, commercial, or residential) anticipated in the next 2 - 3 years, such that either flow or BOD_5 loadings to the sewerage system could significantly increase (25%)?	No = 0 points Yes = 10 points	0
	TOTAL PART III =	0

Part III: NEW DEVELOPMENT (cont.)

B. Approximate number of new residential sewer connections in the last year

65 new residential connections

C. Approximate number of new commercial/industrial connections in the last year

0 new commercial/industrial connections

D. Approximate number of new population serviced in the last year

221 new people served

E. Total number of effective residential connections (ERC) served

2236 total ERC served

Part IV: OPERATOR CERTIFICATION

A. How many collection system operators are currently employed by your facility?

4 collection system operators employed

B. You are required to have the chief direct responsible charge (DRC) operator(s) certified at COLLECTION II.

What is the current grade of the collection DRC operator(s)? IV

C. What is/are the name(s) of your wastewater treatment DRC operator(s)?

KEVIN MAUGHAN

TOM BROADBENT

D. State of Utah Administrative Rules requires all operators, of public systems, considered to be in DRC to be appropriately certified. List all the operators in your system by their certification class. Attach additional pages if necessary.

Not Certified	
Small Lagoons	
Collection I	
Collection II	2
Collection III	
Collection IV	2

Part IV: OPERATOR CERTIFICATION (cont.)

E. Please complete the following table:

Question	Points Earned	Total Points
Is/are your DRC operator(s) currently certified at the appropriate grade for this facility? (see C)	Yes = 0 points No = 50 points	0
How many continuing education units has each of the DRC operator(s) completed over the last 3 years?	3 or more = 0 points less than 3 = 10 points	0
	TOTAL PART IV =	0

Part V: FACILITY MAINTENANCE

A. Please complete the following table:

Question	Points Earned	Total Points
Do you follow an annual preventative maintenance program?	Yes = 0 points No = 30 points	0
Is it written?	Yes = 0 points No = 20 points	0
Do you have a written emergency response plan?	Yes = 0 points No = 20 points	0
Do you have an updated operations and maintenance manual	Yes = 0 points No = 20 points	0
Do you have a written safety plan?	Yes = 0 points No = 20 points	0
	TOTAL PART V =	0

Part VI: SSMP EVALUATION

A. Has your system completed its Sewer System Management Plan (SSMP)?

No _____ Yes __X__

B. If the SSMP has been completed, has the SSMP been public noticed?

No _____ Yes (include date of public notice) ____Y_____

C. Has the SSMP been approved by the permittee's governing body at a public meeting?

No _____ Yes __Y__

D. During the annual assessment of the SSMP, were any adjustments needed based on the performance of the plan?

No __X__ Yes _____ If yes, what components of the plan were changed (i.e. line cleaning, CCTV inspections and manhole inspections and/or SSO events)?

_____

_____

E. During 2016 was any part of the SSMP audited as part of the five year audit?

No __X__ Yes _____If yes, what part of the SSMP was audited and were changes made to the SSMP as a result of the audit? _____

_____

_____

_____

F. Has your system completed its *System Evaluation and Capacity Assurance Plan* (SECAP) as defined by the Utah Sewer Management Program?

No _____ Yes __X__

The following are dates that the SSMP and SECAP are required to be completed, based on population. The SSMP and SECAP must be public noticed and approved by the permittee's governing body in order to be considered complete.

Requirement	Population				
	Less than 2,000	2,000 – 3,500	3,501 – 15,000	15,001 – 50,000	More than 50,000
Completion of SSMP	March 31, 2016	March 31, 2016	September 30, 2016	March 31, 2016	September 30, 2016
Completion of SECAP	Optional	September 30, 2017	September 30, 2016	March 31, 2016	September 30, 2016

Part VII: SUBJECTIVE EVALUATION

This section should be completed with the system operators.

A. Describe the physical condition of the sewer collection system: (lift stations, etc. included)

Good - MINOR LEAKS - ON LIST to Fix

B. What sewerage system improvements does the community plan to have under consideration for the next 10 years?

SEAL LEAKS AT MAN holes & pipe joints
SOME CONTROL GATE Replacement

C. Explain problems, other than plugging, that you have experienced over the last year

NONE

D. Is your community presently involved in formal planning for system expansion/upgrading? If so explain.

MAYBE... A DISTRICT IS BEING DISCUSSED WITH 2 NEIGHBORING COMMUNITIES

G. Does the municipality/district pay for the continuing education expenses of operators?

ALWAYS X SOMETIMES _____ NO _____

If they do, what percentage is paid?

approximately 100 %

H. Is there a written policy regarding continuing education and training for wastewater operators?

YES X NO _____

I. Any additional comments? (Attach additional sheets if necessary.)

POINT SUMMATION

Fill in the point totals from Parts II through V in the blanks provided in the Points column. Add the numbers to determine the MWPP point total that your wastewater facility has generated for the past twelve months.

Part	Points
II	0
III	0
IV	0
V	0
Total	0

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Kevin Maughan — Signature of Signatory Official

6-26-17 — Date

KEVIN MAUGHAN — Print Name of Signatory Official

MANAGER — Title

The signatory official is the person authorized to sign permit documents, per R317-8-3.4.

Municipal Wastewater Planning Program (MWPP)
Mechanical Plant Section for 2016

Owner Name: HYRUM

Name and Title of Contact Person:

KEVIN MAUGHAN

MANAGER

Phone: 435-881-0562

E-mail: Kmaughan@hyrumcity.com

SUBMIT BY APRIL 15, 2017

Electronic submission: http://deq.utah.gov/ProgramsServices/services/submissions/index.htm

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Division of Water Quality
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P.O. Box 144870
Salt Lake City, Utah 84114-4870
Phone: (801) 536-4300

Form completed by:

KEVIN MAUGHAN

May Receive Continuing Education Units(CEUs)

Part I: INFLUENT INFORMATION

N. Please provide the average <u>design</u> flow rate and average <u>design</u> BOD_5 and TSS loading for your facility.

	Average Design Flow (MGD)	Average Design BOD_5 Loading (lbs/day)	Average Design TSS Loading (lbs/day)
Design Criteria	2	3698	3336
90% of the Design Criteria	1.8	3058	3006

B. Please list the average monthly flows in millions of gallons per day (MGD) and BOD_5 and TSS loadings in milligrams per liter (mg/L) ***received*** at your facility during 2016. (Calculate the BOD_5 and TSS loadings in pounds per day (lbs/day).

Month	(1) Average Monthly Flow (MGD)	(2) Average Monthly BOD_5 Concentration (mg/L)	(3) Average BOD_5 Loading (lbs/day)[1]	(4) Average Monthly TSS Concentration (mg/L)	(5) Average TSS Loading (lbs/day)[2]
January	0.837	166	1159	155	1081
February	0.961	145	1162	147	1178
March	1.163	104	1009	103	999
April	1.125	110	1032	REUSE	—
May	0.955	112	892	REUSE	—
June	0.952	109	869	REUSE	—
July	0.901	280	2104	REUSE	—
August	0.992	117	967	REUSE	—
September	0.894	107	797	REUSE	—
October	0.959	119	951	REUSE	—
November	0.908	105	795	128	969
December	1.068	117	984	121	1017
Average	0.966	133	1060	131	1049

1 BOD_5 Loading (3) = Average Monthly Flow (1) x Average Monthly BOD_5 Concentration (2) x 8.34
2 TSS Loading (5) = Average Monthly Flow (1) x Average Monthly TSS Concentration (4) x 8.34

C. Refer to the information in A & B to determine a point value for your facility. Please enter the points for each question in the blank provided.

Question	Number	Points Earned	Total Points
How many times did the average monthly flow (Part B , Column 1) to the wastewater facility exceed 90% of design flow?	0	0 = 0 points 1 - 2 = 10 points 3 - 4 = 20 points 5 or more = 30 points	0
How many times did the average monthly flow (Part B , Column 1) to the wastewater facility exceed the design flow?	0	0 = 0 points 1 - 2 = 20 points 3 - 4 = 40 points 5 or more = 60 points	0
How many times did the average monthly BOD_5 loading (Part B , Column 3) to the wastewater facility exceed 90% of the design loading?	0	0-1 = 0 points 1 - 2 = 10 points 3 - 4 = 20 points 5 or more = 30 points	0
How many times did the average monthly BOD_5 loading (Part B , Column 3) to the wastewater facility exceed the design loading?	0	0 = 0 points 1 - 2 = 20 points 3 - 5 = 40 points 5 or more = 60 points	0
		TOTAL PART I =	0

Part II: EFFLUENT INFORMATION

A. Please list the average monthly BOD_5, TSS, Ammonia (NH_3), monthly maximum total residual chlorine (TRC) minimum monthly dissolved oxygen (DO), and 30-day geometric averages for Fecal and Total Coliform, or E-Coli discharged by your facility during 2016.

Month	(1) BOD_5 (mg/L)	(2) TSS (mg/L)	(3) Fecal Coliform (#/100 mL)	(4) Total Coliform (#/100 mL)	(5) E-Coli	(6) TRC (mg/L)	(7) DO (mg/L)	(8) NH_3 (mg/L)
	Whole Numbers Only					One Decimal Place Only		
January	1	1	N	N	0.5	N	N	1
February	1	3			0.25			2
March	2	3			0.63			2
April	1	NA			0.30			0.9
May	1	NA			0.22			0.9
June	1	NA			0.12			0.9
July	1	NA			0.42			0.5
August	3	NA			0.20			0.7
September	1	NA			0			0.5
October	1	NA			0.13			1
November	1	2			0.36			2
December	1	1			0.30			3
Average	1	2	A	A		A	A	1

B. Please list the monthly average permit limits for the facility in the blanks below.

	BOD_5 ($CBOD_5$) (mg/L)	maximum Cl_2 (mg/L)	NH_3 (mg/L)	minimum DO (mg/L)
Monthly Permit Limit	25	NA	NA	NA
80% of the Permit Limit	20	NA	NA	NA

C. Refer to the information in A & B and your operating reports to determine a point values for your facility.

Question	Number	Points Earned	Total Points
How many months did the effluent BOD_5 ($CBOD_5$) exceed 80% of monthly permit limit?	0	0 - 1 = 0 points 2 = 5 points 3 = 10 points 4 = 15 points 5 or more = 20 points	0
How many months did the effluent BOD_5 ($CBOD_5$) exceed the monthly permit limits?	0	0 = 0 points 1 - 2 = 10 points 3 or more = 20 points	0
How many months did the effluent TSS exceed 20 mg/L?	0	0 - 1 = 0 points 2 = 5 points 3 = 10 points 4 = 15 points 5 or more = 20 points	0
How many months did the effluent TSS exceed 25 mg/L?	0	0 = 0 points 1 - 2 = 10 points 3 or more = 20 points	0
How many times did the TRC exceed permit limit?	0	0 = 0 points 1 - 2 = 15 points 3 or more = 30 points	0
How many times did the NH_3 exceed permit limits?	0	0 = 0 points 1 - 2 = 15 points 3 or more = 30 points	0
How many times did the DO not meet permit limit?	0	0 = 0 points 1 - 2 = 15 points 3 or more = 30 points	0
How many months did the 30-day fecal coliform exceed 200 #/100 mL?	0	0 = 0 points 1 - 2 = 10 points 3 or more = 20 points	0
How many months did the 30-day total coliform exceed 2,000 #/100 mL?	0	0 = 0 points 1 - 2 = 10 points 3 or more = 20 points	0
How many months did the 30-day E-coli exceed 126 #/100 mL?	0	0 = 0 points 1 - 2 = 10 points 3 or more = 40 points	0
		TOTAL PART II =	0

Part III: FACILITY AGE

In what year were the following process units constructed or underwent a major upgrade? To determine a point score subtract the construction or upgrade year from 2016.

Points = Age = Present Year - Construction or Upgrade Year.

Enter the calculated age below.

If the point total exceeds 20 points, enter only 20 points.

Unit Process	Current Year	Construction or Last Upgrade Year	Age = Points
Headworks	2016	2004	12
Primary Treatment	2016	2004	12
Secondary Treatment	2016	2004	12
Solids Handling	2016	2002	14
Disinfection	2016	2004	12
		TOTAL PART III (not greater than 20) =	20

Part IV: BYPASSES

Please complete the following table:

Question	Number	Points Earned	Total Points
How many days in the past year was there a bypass or overflow of untreated wastewater due to high flows?	0	0 = 0 points 1 = 5 points 2 = 10 points 3 = 15 points 4 = 20 points 5 or more = 25 points	0
How many days in the last year was there a bypass or overflow of untreated wastewater due to equipment failure?	0	0 = 0 points 1 = 5 points 2 = 10 points 3 = 15 points 4 = 20 points 5 or more = 25 points	0
		TOTAL PART IV =	0

Part V: SOLIDS HANDLING

A. Please complete the following table:

Current Disposal Method (check all that apply)	Points Earned	Total Points
Landfill	Class B = 0 points < Class B = 50 points	0
Land Application	Site Life 0 - 5 years = 20 points 5 - 10 years = 10 points 10 + years = 0 points	0
Give Away/Distribution and Marketing	Class A = 10 points Class B = 20 points	20
	TOTAL PART V =	20

Part VI: NEW DEVELOPMENT

A. Please complete the following table:

Question	Points Earned	Total Points
Has an industry or other development moved into the community or expanded production in the past two years, such that either flow or wastewater loadings to the sewerage system were significantly increased (10 - 20%)?	No = 0 points Yes = 10 points	0
Are there any major new developments (industrial, commercial, or residential) anticipated in the next 2 - 3 years, such that either flow or BOD_5 loadings to the sewerage system could significantly increase (25%)?	No = 0 points Yes = 10 points	0
Have you experienced any upset due to septic haulers?	No = 0 points Yes = 10 points	0
	TOTAL PART VI =	0

Part VI: NEW DEVELOPMENT (cont.)

B Approximate number of new residential sewer connections in the last year

165 new residential connections

C. Approximate number of new commercial/industrial connections in the last year

0 new commercial/industrial connections

D. Approximate number of new population serviced in the last year

221 new people served

E. Total number of effective residential connections (ERC) served

2236 total ERC served

Part VII: OPERATOR CERTIFICATION

A. How many wastewater treatment operators are currently employed by your facility?

4 wastewater treatment operators employed

B. You are required to have the chief direct responsible charge (DRC) operator(s) certified at TREATMENT III.

What is the current grade of the treatment DRC operator(s)? IV

C. What is/are the name(s) of your wastewater treatment DRC operator(s)?

KEVIN MAUGHAN

TOM BROADBENT

D. State of Utah Administrative Rules Require all operators considered to be in DRC to be appropriately certified. List all the operators in your system by their certification class.

Not Certified	
Treatment I	
Treatment II	2
Treatment III	
Treatment IV	2

E. Please complete the following table:

Question	Points Earned	Total Points
Is/are your DRC operator(s) currently certified at the appropriate grade for this facility? (see C)	Yes = 0 points No = 50 points	0
How many continuing education units has each of the DRC operator(s) completed over the last 3 years?	3 or more = 0 points less than 3 = 10 points	0
	TOTAL PART VII =	0

Part VIII: FACILITY MAINTENANCE

A. Please complete the following table:

Question	Points Earned	Total Points
Do you follow an annual preventative maintenance program?	Yes = 0 points No = 30 points	0
Is it written?	Yes = 0 points No = 20 points	0
Do you have a written emergency response plan?	Yes = 0 points No = 20 points	0
Do you have an updated operations and maintenance manual?	Yes = 0 points No = 20 points	0
Do you have a written safety plan?	Yes = 0 points No = 20 points	0
	TOTAL PART VIII =	0

Part IX: SUBJECTIVE EVALUATION

This section should be completed with the facility operators.

A. Do you consider your wastewater facility to be in good physical and structural condition?

YES X NO _____

If NOT, why?

B. What improvements do you think the plant will need in the next 5 years?

- complete BASIN 4 with membranes
- Replace some Flow gates

C. Does the municipality/district pay for the continuing education expenses of operators?

ALWAYS X SOMETIMES _____ NO _____

If so, what percentage do they pay?

Approximately 100 %

D. Is there a written policy regarding continuing education and training for wastewater operators?

YES X NO _____

E. Have you done any major repairs or mechanical equipment replacement in 2016? (do not include construction or upgrade projects)

YES X NO _____

F. What was the approximate cost for those repairs or replacements?

$ 415000

G. Any additional comments? (Attach additional sheets if necessary.)

370 000 NEW MEMBRANES

45 000 BLOWER MOTORS + REPAIRS

POINT SUMMATION

Fill in the values from Parts I through VIII in the blanks provided in the Points column. Add the numbers to determine the MWPP point total that your wastewater facility has generated for the past twelve months.

Part	Points
I	0
II	0
III	20
IV	0
V	20
VI	0
VII	0
VIII	0
Total	40