

CITY OF BANGOR WASTEWATER RATE

CALCULATION REPORT

BASE CHARGE USING METER SIZE AND CAPITAL IMPROVEMENT AND DEBT INCLUDED IN BASE

SEPTEMBER 2024'



Prepared By:

Name	Title	Employer	Email
Matt Lumbert	Wastewater Tech	Michigan Rural Water Association	mlumbert@mrwa.net
Joe VanDommelen	EPA Training Specialist	Michigan Rural Water Association	jvandommelen@mrwa.net
Stephanie Cagle	Treasurer	City of Bangor	treasurer@bangormi.org
Shelly Umbanhowar	Clerk	City of Bangor	clerk@bangormi.org
Justin Weber	City Manager	City of Bangor	j.weber@bangormi.org

YOUR RATE EVALUATION SHOULD BE REVIEWED BY A CERTIFIED FINANCIAL PLANNER AND YOUR ATTORNEY

**CITY OF BANGOR
WASTEWATER RATE
CALCULATION REPORT**

DATE SEPTEMBER 2024'

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INTRODUCTION

Wastewater collection and treatment is an essential public service provided to Community residents to protect their health and enhance their quality of life by protecting the environment in which they live. Over many years the Community has invested in the essential infrastructure and services necessary to collect, transport, and ensure treatment of the sanitary wastewater from homes and businesses located within the Community.

The construction and maintenance of this infrastructure is one of the most costly investments residents of the Community make. Community officials strive to ensure that the resident's investment in these facilities is based on sound judgment, cost effectiveness, and sustainable financing for the present and future. The purpose of analyzing utility rates is to ensure;

- a) Compliance with federal and state regulations governing utility rates, and
- b) That adequate revenue is collected through service charges to support the cost of providing the service and
- c) That the rates are equitable to all users of the service.

That is, each user's share of the cost is proportionate to their use of the system.

REVENUE REQUIREMENT = TOTAL SYSTEM COST

Ensuring that the revenue covers the total system cost means the service is "sustainable". That is, the system will serve the present needs and will continue to meet future needs.

Total system cost is comprised of the following cost components:

Operation & Maintenance (O&M) expenses. These are the daily costs of labor, materials, supplies, utilities, etc. necessary to operate and maintain the facilities.

Replacement expenses. These are costs to replace operating equipment with a useful life of 20 years or less. The sum of O&M expense and replacement expense is referred to as OM&R.

Capital improvements. These are costs to replace structural components with useful life greater than 20 years and or to expand and improve the current facilities.

Administrative expenses. These are the costs of general management, financial management, meter reading, and billing & collections.

Debt service expenses. These are the annual costs of loans or bond repayment used to finance construction and generally includes facilities and structures with a useful life of 20 years or more.

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6 CURRENT RATE CHARGES & NUMBER OF CUSTOMERS

7 METER EQUIVALENTS BY SIZE AND COST RATIO

8 UNITS OF WATER INVOICED TO CUSTOMERS

BACKGROUND / STARTING INFORMATION	
Name of Community :	City of Bangor
PHYSICAL ADDRESS	257 W. Monroe Street
MAILING?	257 W. Monroe Street
ZIP CODE	49013
OFFICE PHONE NUMBER	269-427-5831
Can information in this report be used and submitted for USDA Rural Development (Similar Systems Survey)	Yes
BUDGET FOR FISCAL YEARS <u>STARTING</u>	2024
<u>Current Rate Structure</u>	
Are bills based on 1,000 gallons units or 100 cubic feet units?	100
Number of Customer Invoices per Year	12
What are the dates of the Fiscal Year	JULY 1ST'
List the names of the different Entities Served OR RATE CLASSES - Originating Entity - RATE CLASS 1	City of Bangor
2nd Entity	Township Customers

MICHIGAN RURAL WATER ASSOCIATION RATE EVALUATION PROGRAM

City of Bangor				
CURRENT RATE CHARGES & NUMBER OF CUSTOMERS				
Customers Are Invoiced MONTHLY PER				
City of Bangor				
TYPE OF WATER UNITS	100 CUFT	Sewer is \$4.68 per 100 cubic feet plus the \$2.25 sewer debt charge per 100 cubic feet gives you \$6.93 fee per 100 cubic feet. There are currently 755 City Sewer Debt customers and 754 City Sewer Commodity customers.		
COST PER 100 CUBIC FT.	\$6.93			
INVOICES PER YEAR	12			
METER SIZE IN INCHES	CURRENT "BASE RATE" CHARGE	NUMBER OF METERS / REU'S	INVOICES PER YEAR	ANNUAL INCOME
3/4	\$5.00	714	12	\$42,840
1	\$5.00	24	12	\$1,440
1 1/2	\$5.00	0	12	\$0
2	\$5.00	13	12	\$780
3	\$5.00	1	12	\$60
4	\$5.00	3	12	\$180
6	\$5.00		12	\$0
8	\$5.00		12	\$0
TOTALS		755		\$45,300

Township Customers						
TYPE OF WATER UNITS	100 CUFT		Ratio Entity # 2 vs. 1	The Township rate is 2x the city rate. There are 21 township sewer commodity customers and 18 township sewer debt customers.		
COST PER WATER UNIT	\$13.86		2.00			
INVOICES PER YEAR	12					
METER SIZE IN INCHES	CURRENT "BASE RATE" CHARGE	Ratio Entity # 2 vs. 1	Ratio Entity # 2 vs. 1	NUMBER OF METERS / REU'S	INVOICES PER YEAR	ANNUAL INCOME
3/4	\$10.00	2.00	2.00	21	12	\$2,520
1	\$10.00	2.00			12	\$0
1 1/2	\$10.00	2.00			12	\$0
2	\$10.00	2.00			12	\$0
3	\$10.00	2.00			12	\$0
4	\$10.00	2.00			12	\$0
6		0.00			12	\$0
8		0.00			12	\$0
				21		\$2,520

NAME OF PERSON PROVIDING # OF METERS COUNT	Stephanie Cagle
WAS A REPORT USED TO GENERATE THIS DATA?	Yes
WAS REPORT COPIED INTO THIS FILE?	No, electronic copy saved

MICHIGAN RURAL WATER ASSOCIATION RATE EVALUATION PROGRAM

METER EQUIVALENTS BY SIZE AND COST RATIO

									100%	1.00
2024 YEAR 1	CURRENT CHARGES RATE CLASS 1		RATE CLASS 2						NEW RATES	
	City of Bangor		Township Customers						City of Bangor	
METER SIZE IN INCHES	NUMBER OF METERS / REU'S	INVOICE FREQUENCY	NUMBER OF METERS / REU'S	INVOICE FREQUENCY	TOTAL CUSTOMERS ALL ENTITIES	SELECTED METER EQUIVALENT	CALCULATED METER EQUIVALENT USED	ANNUAL METER EQUIVALENTS	ORIGINAL ENTITY 1	
3/4	714	12	21	12	735	1.00	1.00	9,072	\$20.00	
1	24	12	0	12	24	1.67	1.67 3.33 5.33 10.00 16.67 33.33	480	\$33.33	
1 1/2	0	12	0	12	0	3.33		66.67		
2	13	12	0	12	13	5.33		832	\$106.67	
3	1	12	0	12	1	10.00		120	\$200.00	
4	3	12	0	12	3	16.67		600	\$333.33	
6	0	12	0	12	0	33.33			\$666.67	
TOTAL	755		21		776					
ANNUAL METER EQUIVALENTS USED FOR RATE CALCULATION								11,104		
<div style="border: 1px solid black; padding: 5px; display: flex; align-items: center;"> <div style="border: 1px solid black; padding: 2px; margin-right: 5px; text-align: center; width: 30px; height: 30px; line-height: 30px;">X</div> <div> <p style="color: red; margin: 0;">CHECK BOX TO CONFIRM THAT METER EQUIVALENT RATIOS WERE DISCUSSED AND CHOSEN BY COMMUNITY</p> </div> </div>										

This table list the number of water meters being invoiced for each size water meter. It then calculates the annual meter equivalent REU's (Residential Equivalent Meters). This figure will be used to calculate the Ready to Serve Charge for each meter size.

City of Bangor						UNITS OF WATER INVOICED TO CUSTOMERS					FOR THIS EVALUATION WE WILL USE THE		AVERAGE
USAGE REPORTED IN		CUBIC FEET											
USAGE REPORTED IN		FISCAL YEARS											
	2019/2020	2020/2021	2021/2022	2022/2023	2023/2024	AVERAGE	MAX. YEAR	MIN. YEAR	PERCENT DIFFERENCE FROM MAX. TO MIN. YEAR	ANTICIPATED PERCENT INCREASE NEXT YEAR	UNITS USED IN RATE EVALUATION		
City of Bangor	6,327,107	5,089,223	6,951,129	6,739,440	6,398,290	6,301,038	6,951,129	5,089,223	27%	0.0%	6,301,038		
Township Customers	117,672	99,753	116,009	134,459	111,310	115,841	134,459	99,753	26%	0.0%	115,841		
TOTALS	6,444,779	5,188,976	7,067,138	6,873,899	6,509,600	6,416,878	7,085,588	5,188,976	26%		6,416,878		
WHO PROVIDED UNITS INVOICED REPORT			Stephanie Cagle										
WAS THE REPORT COPIED INTO THIS EXCEL FILE?			Yes										
WAS AN ELECTRONIC COPY OF THE ORIGINAL KEPT ?			Yes										
											GALLONS INCREASE	(1,227,902)	
											GALLONS / VOLUME USED FOR EVALUATION	6,416,878	

The Volumes listed above are only those gallons that are a revenue source. The gallons listed above were generated by the COMMUNITY. The COMMUNITY takes full responsibility for the accuracy of these numbers. And the anticipated units of water invoiced used to calculate the user rates.
PER



CHECK BOX TO CONFIRM THAT UNITS USED FOR EVALUATION WAS DISCUSSED AND CHOSEN BY COMMUNITY

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9 **ANNUAL BUDGET / EXPENSES INDEX**

10 BANK BALANCES

11 TOTAL COMBINED CURRENT INCOME

12 EXPENSES

13 NON-SALES & OTHER REVENUE

City of Bangor

BALANCE PER BOOKS

BALANCES WERE OBTAINED ON DATE OF

CHECKING ACCOUNTS

Name of Account / Description	Purpose	Balance
SEWER		\$ 3,393,509
Total Balance:		\$3,393,509

GENERAL CHECKING \$3,393,509

GENERAL RESERVE \$0

TOTAL AVAILABLE UNRESTRICTED	\$3,393,509
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RESTRICTED \$0

TOTAL CASH BALANCE	\$3,393,509
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APPLIED TO RESERVE ACCOUNTS

EQUIPMENT REPLACEMENT # 1 \$250,000

ASSET REPLACEMENT # 2 \$250,000

CAPITAL IMPROVEMENT

TOTAL APPLIED TO RESERVE ACCOUNTS \$500,000

BALANCE REMAINING FOR ANNUAL EXPENSES	\$2,893,509
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GENERAL RESERVE ACCOUNTS

INCLUDING RRI, INTEREST & REDEMPTION - ETC

Name of Account / Description	Purpose	Balance
Total Balance:		\$0

RESTRICTED MONEY - RESTRICTED RESERVE ACCOUNTS

ONLY BOND RESERVE TYPE ACCOUNTS

Name of Account / Description	Purpose	Balance
Total Balance:		\$0

CURRENT REVENUE BASED ON CURRENT RATE CHARGES

City of Bangor		RATE CLASS 2	2024
	City of Bangor	Township Customers	REVENUE
	New Cost per Unit of Water Sold		NEW RATES
\$ PER 100 CUFT	\$6.930	\$13.860	
UNITS Sold	63,983	1,113	65,096
Income	\$443,401	\$15,428	\$458,829

METER SIZE	NEW BASE RATE PER MONTH		
3/4	\$5.00	\$10.00	
NO. CUSTOMERS	714	21	
<i>INCOME</i>	\$42,840.00	\$2,520.00	\$45,360
1	\$5.00	\$10.00	
NO. CUSTOMERS	24	0	
<i>INCOME</i>	\$1,440.00	\$0.00	\$1,440
1 1/2	\$5.00	\$10.00	
NO. CUSTOMERS	0	0	
<i>INCOME</i>	\$0.00	\$0.00	\$0
2	\$5.00	\$10.00	
NO. CUSTOMERS	13	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	156	0	
<i>INCOME</i>	\$780.00	\$0.00	\$780
3	\$5.00	\$10.00	
NO. CUSTOMERS	1	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	12	0	
<i>INCOME</i>	\$60.00	\$0.00	\$60
4	\$5.00	\$10.00	
NO. CUSTOMERS	3	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	36	0	
<i>INCOME</i>	\$180.00	\$0.00	\$180
6	\$5.00	\$0.00	
NO. CUSTOMERS	0	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	0	0	
<i>INCOME</i>	\$0.00	\$0.00	\$0

CURRENT Fixed Income "RTS"	\$47,820
CURRENT VOLUME "UNITS WATER INVOICED" INCOME	\$458,829
CURRENT INCOME - GENERATED WITH CURRENT RATES RTS & UNITS INVOICED	\$506,649
LAST YEARS NON-SALES INCOME	\$563,000
LAST YEARS TOTAL COMBINED INCOME	\$1,069,649

MICHIGAN RURAL WATER ASSOCIATION RATE EVALUATION PROGRAM

PRIOR YEAR ACTUALS EXPENSES (COMPARISON PURPOSES ONLY)			ACCT #	City of Bangor	PROPOSED BUDGET FOR FISCAL YEAR	YEAR 2	YEAR 3	YEAR 4	YEAR 5
2021/2022	2022/2023	2023/2024				PROJECTED BUDGET	PROJECTED BUDGET	PROJECTED BUDGET	PROJECTED BUDGET
			ANNUAL PERCENT INCREASE		2.00%	2.00%	2.00%	2.00%	
			EXPENSES	2024	2025	2026	2027	2028	
\$85,751	\$79,893	\$56,271	590-548-703.000	SALARY	\$65,000	\$66,300	\$67,626	\$68,979	\$70,358
\$43,124	\$29,140	\$37,635	590-548-706.000	HOURLY WAGES	\$40,000	\$40,800	\$41,616	\$42,448	\$43,297
\$1,376	\$522	\$626	590-548-706.001	OVERTIME	\$2,000	\$2,040	\$2,081	\$2,122	\$2,165
\$0	\$0	\$0	590-548-714.000	FRINGE BENEFITS	\$0	\$0	\$0	\$0	\$0
\$9,929	\$8,581	\$5,962	590-548-715.000	FICA & MEDICARE	\$7,000	\$7,140	\$7,283	\$7,428	\$7,577
\$2,005	\$2,340	\$786	590-548-716.000	HEALTH INSURANCE	\$3,750	\$3,825	\$3,902	\$3,980	\$4,059
\$125,124	\$0	\$0	590-548-716.100	HEALTH INSURANCE-RETIREE	\$0	\$0	\$0	\$0	\$0
\$457	\$0	\$0	590-548-723.000	RETIREMENT CONTRIBUTIONS	\$0	\$0	\$0	\$0	\$0
\$19	\$209	\$322	590-548-724.000	UNEMPLOYMENT	\$500	\$510	\$520	\$531	\$541
\$808	\$3,494	\$215	590-548-725.000	WORK COMP	\$500	\$510	\$520	\$531	\$541
\$2,564	\$2,203	\$3,045	590-548-727.000	OFFICE SUPPLIES	\$4,800	\$4,896	\$4,994	\$5,094	\$5,196
\$4,360	\$13,592	\$16,457	590-548-740.000	OPERATING SUPPLIES	\$10,000	\$10,200	\$10,404	\$10,612	\$10,824
\$138,666	\$255,556	\$75,922	590-548-775.000	REPAIRS & MAINT	\$60,000	\$61,200	\$62,424	\$63,672	\$64,946
\$0	\$0	\$0	590-548-802.000	ENGINEERING	\$0	\$0	\$0	\$0	\$0
\$0	\$0	\$4,952	590-548-808.000	AUDIT	\$5,000	\$5,100	\$5,202	\$5,306	\$5,412
\$19,460	\$136,922	\$39,287	590-548-818.000	CONTRACTUAL SERVICES	\$20,000	\$20,400	\$20,808	\$21,224	\$21,649
\$0	\$234	\$6,459	590-548-818.001	CONTRACTUAL SERVICES	\$6,500	\$6,630	\$6,763	\$6,898	\$7,036
\$0	\$8,796	\$0	590-548-826.000	LEGAL FEES	\$0	\$0	\$0	\$0	\$0
\$2,909	\$4,516	\$3,096	590-548-850.000	COMMUNICATIONS	\$3,000	\$3,060	\$3,121	\$3,184	\$3,247
\$200	\$1,008	\$613	590-548-864.000	MEMBERSHIP AND DUES	\$1,000	\$1,020	\$1,040	\$1,061	\$1,082
\$0	\$287	\$222	590-548-900.000	PRINTING & PUBLISHING	\$0	\$0	\$0	\$0	\$0
\$194	\$8,700	\$3,692	590-548-910.000	INSURANCE & BONDS	\$5,000	\$5,100	\$5,202	\$5,306	\$5,412
\$40,865	\$50,177	\$53,150	590-548-920.000	UTILITIES	\$50,000	\$51,000	\$52,020	\$53,060	\$54,122
\$32,000	\$60,000	\$0	590-548-943.000	EQUIPMENT RENTAL	\$75,000	\$76,500	\$78,030	\$79,591	\$81,182
\$2,646	\$1,280	\$1,389	590-548-956.001	EDUCATION & TRAINING	\$3,000	\$3,060	\$3,121	\$3,184	\$3,247
\$0	\$0	\$0	590-548-964.000	REFUNDS AND REBATES	\$0	\$0	\$0	\$0	\$0
\$0	\$0	\$125,000	590-548-967.000	SEWER POND PROJECT LOAN PRINCIPAL	\$0	\$0	\$0	\$0	\$0
			590-548-967.003		\$0	\$0	\$0	\$0	\$0
\$201,796	\$204,862	\$0	590-548-968.000	SEWER DEPRECIATION	\$0	\$0	\$0	\$0	\$0
\$0	\$0	\$0	590-548-977.000	NEW EQUIPMENT	\$0	\$0	\$0	\$0	\$0
\$0	\$0	\$0	590-548-978.000	CONSTRUCTION	\$0	\$0	\$0	\$0	\$0
\$12,688	\$10,252	\$6,175	590-548-995.000	INTEREST PAYMENT FOR LOAN	\$0	\$0	\$0	\$0	\$0
					\$0	\$0	\$0	\$0	\$0
\$726,941	\$882,561	\$441,273		TOTAL	\$362,050	\$369,291	\$376,677	\$384,210	\$391,895
% INCREASE			-100.0%			YEAR 2	YEAR 3	YEAR 4	YEAR 5
						2025	2026	2027	2028

MICHIGAN RURAL WATER ASSOCIATION RATE EVALUATION PROGRAM

City of Bangor						YEAR 2	YEAR 3	YEAR 4	YEAR 5
ACCOUNT #	NON-SALES & OTHER REVENUE	2021/2022	2022/2023	2023/2024	2024	2025	2026	2027	2028
590-000-452.000	PLUMBING PERMITS:	\$0	\$0	\$0					
590-000-529.003	STATE GRANT REVENUE:	\$0	\$0	\$0					
590-000-545.000	FEDERAL GRANTS:	\$0	\$0	\$0					
590-000-545.003	CDBG GRANT:	\$4,513	\$758,285	\$289,772					
590-000-642.000	CHARGES FOR SERVICE:	\$303,915	\$321,578	-\$4,401,617	\$350,000				
590-000-642.001	SEWER LINE REPLACEMENT:	\$2,706	\$2,645	\$3,037	\$3,000				
590-000-642.003	CAPITAL IMPROVEMENT:	\$0	\$47,605	\$46,525	\$50,000				
590-000-646.000	DELINQUENT FEES:	\$11,923	\$8,165	-\$8,178	\$10,000				
590-000-647.000	WATER ON/OFF:	\$158,261	\$154,303	-\$2,120,577	\$150,000				
590-000-665.000	INTEREST INCOME:	\$0	\$0	\$0					
590-000-670.000	DEVELOPER CONTRIBUTIONS:	\$0	\$0	\$0					
590-000-676.000	GAS:	\$0	\$0	\$0					
590-000-694.000	MISCELLANEOUS INCOME:	\$210,540	\$115,099	\$4,000					
590-000-695.000	INCOME (DECREASE IN OPEB LIABILITY):	\$0	\$0	\$0					
590-000-997.000	TRANSFER IN:	\$0	\$0	\$0					
						Capital Improvement added to Base and removed as non-sales			
TOTAL INCOME (NON SALES)		\$691,857	\$1,407,679	-\$6,187,038	\$563,000	\$0	\$0	\$0	\$0
AVERAGE NON SALES INCOME			\$1,049,768	-\$1,362,501	-\$881,125	-\$1,054,090	-\$1,406,009	\$140,750	\$0
Portion of (Non Sales) Revenue Guaranteed :						\$0	\$0	\$0	\$0
Percent Applied Towards Fixed Rate RTS Charge - PERCENT applied per REU					18%	18%	18%	18%	18%
ANNUAL DOLLARS APPLIED TOWARDS FIXED BUDGET - BASE RATE - RTS					\$0	\$0	\$0	\$0	\$0
TOTAL ANNUAL RESIDENTIAL EQUIVALENT UNITS "REU'S"					11,104	11,104	11,104	11,104	11,104
REDUCTION PER REU PER BILLING PERIOD					\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
ANNUAL DOLLARS APPLIED TOWARDS VARIABLE BUDGET - PER UNIT					\$0	\$0	\$0	\$0	\$0
ANNUAL UNITS OF WATER OR SEWER INVOICED					64,169	64,169	64,169	64,169	64,169
REDUCTION PER UNIT OF WATER OR SEWER					\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
A portion of this revenue will be re-applied back to the water budget to help lower the water rates.									

14 **LOAN / DEBT INFORMATION INDEX**

15 DEBT SCHEDULE / AMORTIZATION SCHEDULE PRINCIPAL & INTEREST

City of Bangor
2024

DEBT SCHEDULE / AMORTIZATION SCHEDULE PRINCIPAL & INTEREST

	1	2	3	4	5	6	7	8	9	10
FISCAL YEAR STARTING	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033
2006 Sewer Loan	\$131,175	\$129,143	\$132,112							
PURPOSE OF LOAN										
DATE OF ISSUE	2006									
DATE OF MATURITY	2026									
PAID BY RATES	YES									
RESERVE REQUIREMENT	NO									
NEW ANTICIPATED CAPITAL LOANS	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
EXISTING + NEW	\$131,175	\$129,143	\$132,112	\$0	\$0	\$0	\$0	\$0	\$0	\$0

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City of Bangor EQUIPMENT REPLACEMENT SHORT LIVED ASSETS		YOUR ANTICIPATED NORMAL INTENDED USEFUL LIFE OR YEARS BETWEEN REHAB SHOULD BE BASED ON PAST MAINTENANCE HISTORY, WELL MAINTENANCE RECORDS AND WATER TOWER INSPECTION REPORTS. - A COPY OF THESE REPORTS SHOULD BE INCLUDED IN YOUR RATE EVALUATION AS AN ATTACHMENT OR APPENDIX --- ALSO NOTE; IF YOU ARE APPLYING FOR A USDA RURAL DEVELOPMENT GRANT OR HOPE TO GET A USDA GRANT - THE REMAINING YEARS OF LIFE FOR ANY EQUIPMENT CAN NOT EXCEED 15 YEARS. FOR ANYTHING - WATER METERS WATER TOWER PAINTING ETC. ONCE THE USEFUL LIFE OR NEXT ANTICIPATED MAINTENANCE IS LESS THAN 15 YEARS AWAY IT CAN BE LISTED HERE,							
2024									
SHORT LIVED ASSETS SOMEWHERE BETWEEN 0-15 OR 20 YEARS									
FIXED ASSET INVENTORY		ASSET REPLACEMENT SCHEDULE							
EQUIPMENT LIST / MAINTENANCE ACTIVITY	DESCRIPTION / MAINTENANCE HISTORY	ORIGINAL INSTALLATION YEAR OR LAST REHAB YEAR	ESTIMATED NORMAL INTENDED USEFUL LIFE	CURRENT AGE	NEXT ANTICIPATED REPLACEMENT YEAR	REMAINING LIFE - YEARS BEFORE REPLACEMENT	TOTAL REPLACEMENT COST	PERCENT OF ASSET LEFT	REPLACEMENT MONEY RESERVED ANNUALLY
ARLINGTON ST LIFT STATION									
PUMP 1		2022	5	2	2027	3	\$43,000	60%	\$8,600
PUMP 2		2022	5	2	2027	3	\$43,000	60%	\$8,600
VFD PUMP 1		2022	15	2	2037	13	\$10,000	87%	\$667
VFD PUMP 2		2022	15	2	2037	13	\$10,000	87%	\$667
CONTROL PANEL	high voltage new in 2022 for \$35,000								
TRANSFER SWITCH	new in 2022								
GENERATOR	new in 2005	2005	20	19	2025	1	\$37,750	5%	\$1,888
CONTROL BUILDING MAINTENANCE	new building in 2022	2022	20	2	2042	18	\$10,000	90%	\$500
ALARMS		2022	15	2	2037	13	\$5,000	87%	\$333
BYPASS PLUMBING	2 VALVES	2022	20	2	2042	18	\$10,000	90%	\$500
FLOW METER	INLINE	2022	20	2	2042	18	\$5,000	90%	\$250
FLOW METER	CHART	2022	20	2	2042	18	\$5,000	90%	\$250
CHART RECORDER		2022	20	2	2042	18	\$2,500	90%	\$125
CHECK VALVES	2 CHECK VALVES	2022	20	2	2042	18	\$10,000	90%	\$500
POWER CORRECTION DEVICE		2022	20	2	2042	18	\$20,000	90%	\$1,000
LIONS PARK LIFT STATION									
PUMP 1		2022	5	2	2027	3	\$35,000	60%	\$7,000
PUMP 2		2022	5	2	2027	3	\$35,000	60%	\$7,000
VFD PUMP 1		2022	15	2	2037	13	\$5,000	87%	\$333
VFD PUMP 2		2022	15	2	2037	13	\$5,000	87%	\$333
CONTROL PANEL	installed in 2022								
ALARM		2022	15	2	2037	13	\$5,000	87%	\$333

City of Bangor EQUIPMENT REPLACEMENT SHORT LIVED ASSETS		YOUR ANTICIPATED NORMAL INTENDED USEFUL LIFE OR YEARS BETWEEN REHAB SHOULD BE BASED ON PAST MAINTENANCE HISTORY, WELL MAINTENANCE RECORDS AND WATER TOWER INSPECTION REPORTS. - A COPY OF THESE REPORTS SHOULD BE INCLUDED IN YOUR RATE EVALUATION AS AN ATTACHMENT OR APPENDIX --- ALSO NOTE; IF YOU ARE APPLYING FOR A USDA RURAL DEVELOPMENT GRANT OR HOPE TO GET A USDA GRANT - THE REMAINING YEARS OF LIFE FOR ANY EQUIPMENT CAN NOT EXCEED 15 YEARS. FOR ANYTHING - WATER METERS WATER TOWER PAINTING ETC. ONCE THE USEFUL LIFE OR NEXT ANTICIPATED MAINTENANCE IS LESS THAN 15 YEARS AWAY IT CAN BE LISTED HERE,							
2024									
SHORT LIVED ASSETS SOMEWHERE BETWEEN 0-15 OR 20 YEARS									
FIXED ASSET INVENTORY		ASSET REPLACEMENT SCHEDULE							
EQUIPMENT LIST / MAINTENANCE ACTIVITY	DESCRIPTION / MAINTENANCE HISTORY	ORIGINAL INSTALLATION YEAR OR LAST REHAB YEAR	ESTIMATED NORMAL INTENDED USEFUL LIFE	CURRENT AGE	NEXT ANTICIPATED REPLACEMENT YEAR	REMAINING LIFE - YEARS BEFORE REPLACEMENT	TOTAL REPLACEMENT COST	PERCENT OF ASSET LEFT	REPLACEMENT MONEY RESERVED ANNUALLY
PARK RD LIFT STATION									
PUMP 1		2005	20	19	2025	1	\$10,000	5%	\$500
PUMP 2		2005	20	19	2025	1	\$10,000	5%	\$500
CONTROL PANEL		2005	20	19	2025	1	\$10,000	5%	\$500
ALARM		2005	15	19	2020	-4	\$5,000	-27%	\$333
WHITE OAK DR LIFT STATION									
PUMP 1		2005	20	19	2025	1	\$10,000	5%	\$500
PUMP 2		2005	20	19	2025	1	\$10,000	5%	\$500
CONTROL PANEL		2005	40	19	2045	21	\$10,000	53%	\$250
ALARM	SENSA PHONE	2005	15	19	2020	-4	\$5,000	-27%	\$333
GETMAN LIFT STATION									
	NEW IN 1981								
PUMP 1	PUMPS INSTALLED 1981 HAVE BEEN REBUILT	1981	20	43	2001	-23	\$10,000	-115%	\$500
PUMP 2		1981	20	43	2001	-23	\$10,000	-115%	\$500
CONTROL PANEL		1981	40	43	2021	-3	\$25,000	-8%	\$625
ALARM	NO ALARMS	1981	15	43	1996	-28	\$5,000	-187%	\$333
							\$416,250	63%	\$ 44,254

EQUIPMENT REPLACEMENT SHORT LIVED ASSETS - RUNNING BALANCE SHEET				
			COST OF LIVING INCREASE	2.00%
			CURRENT RESERVE BALANCE APPLIED TO THIS ACCOUNT - INCLUDES RRI BALANCE	\$250,000
			AVG. INTEREST RATE IN SAVINGS	0.10%
ANNUAL COLA ADJUSTMENT AS ADOPTED BY COUNCIL			0.00%	
Annual Funding Applied to Budget / Rates			\$45,000	
YEAR	PURPOSE	ANNUAL REPLACEMENT EXPENDITURES WITH C.O.L.	FUNDING WITH COLA	RUNNING BALANCE
2024	SEE EQUIPMENT LIST FOR DETAILS OF ANTICIPATED PURCHASES	\$0	\$45,000	\$295,295
2025		\$89,505	\$45,000	\$251,085
2026		\$5,200	\$45,000	\$291,136
2027		\$165,360	\$45,000	\$171,068
2028		\$0	\$45,000	\$216,239
2029		\$0	\$45,000	\$261,455
2030		\$0	\$45,000	\$306,716
2031		\$0	\$45,000	\$352,023
2032		\$180,960	\$45,000	\$216,415
2033		\$0	\$45,000	\$261,631
2034		\$0	\$45,000	\$306,893
2035		\$12,200	\$45,000	\$340,000
2036		\$0	\$45,000	\$385,340
2037		\$246,960	\$45,000	\$183,765
2038		\$0	\$45,000	\$228,949
2039		\$0	\$45,000	\$274,178
2040		\$0	\$45,000	\$319,452
2041		\$33,500	\$45,000	\$331,272
2042		\$297,160	\$45,000	\$79,443
2043		\$0	\$45,000	\$124,522
2044		\$0	\$45,000	\$169,647
				\$385,000

City of Bangor

EQUIPMENT REPLACEMENT PAGE 2

2024

MID-TERM ASSETS 15-30 YEARS

FIXED ASSET INVENTORY									ANNUAL RESERVE
ASSET REPLACEMENT SCHEDULE									REPLACEMENT MONEY RESERVED ANNUALLY
EQUIPMENT LIST / MAINTENANCE ACTIVITY	DESCRIPTION / MAINTENANCE HISTORY	ORIGINAL INSTALLATION YEAR	NORMAL INTENDED USEFUL LIFE	CURRENT AGE	NEXT REPLACEMENT YEAR	REMAINING LIFE - YEARS BEFORE REPLACEMENT	TOTAL REPLACEMENT COST	PERCENT CONSUMED	
LAGOONS									
POND 1 CLEANING	calculated using area x 2' x 7.48 for gallons then \$0.11 per gallon	2005	30	19	2035	11	\$200,000	63%	\$6,667
POND 2		2005	40	19	2045	21	\$770,000	48%	\$19,250
POND 3	3&4 ARE FINISHING PONDS								
POND 4	3&4 CLEANED IN 2005								
POND 1 AERATOR MOTORS	7 TOTAL	2005	10	19	2015	-9	\$45,500	190%	\$4,550
POND 1 AERATOR UNITS		2005	20	19	2025	1	\$105,000	95%	\$5,250
LAB BUILDING		2005	20	19	2025	1	\$15,000	95%	\$750
VALVES	15 TOTAL VALVES	2005	20	19	2025	1	\$30,000	95%	\$1,500
CONTROL PANEL		2005	20	19	2025	1	\$15,000	95%	\$750
FENCE MAINTENANCE		2005	20	19	2025	1	\$20,000	95%	\$1,000
PORTABLE GENERATOR		2005	40	19	2045	21	\$35,000	48%	\$875
CUSTOMER METERS	SPLIT 50/50 WITH WATER	2024	15	0	2039	15	\$165,000	0%	\$11,000
							\$1,400,500		\$ 51,592

EQUIPMENT REPLACEMENT PAGE 2 RUNNING BALANCE				
COST OF LIVING INCREASE			2.00%	
CURRENT RESERVE BALANCE APPLIED TO THIS ACCOUNT			\$250,000	
AVG. INTEREST RATE IN SAVINGS			0.10%	
Annual Funding Applied to Budget / Rates			\$90,000	
YEAR	PURPOSE	ANNUAL REPLACEMENT EXPENDITURES WITH C.O.L.	ANNUAL FUNDING AMOUNT	RUNNING BALANCE IN ACCOUNT
2024	SEE EQUIPMENT LIST	\$0	\$90,000	\$340,340
2025	FOR ANNUAL EXPENDITURES	\$235,110	\$90,000	\$195,570
2026	0	\$0	\$90,000	\$285,766
2027	0	\$0	\$90,000	\$376,052
2028	0	\$0	\$90,000	\$466,428
2029	0	\$0	\$90,000	\$556,894
2030	0	\$0	\$90,000	\$647,451
2031	0	\$0	\$90,000	\$738,099
2032	0	\$0	\$90,000	\$828,837
2033	0	\$0	\$90,000	\$919,665
2034	0	\$0	\$90,000	\$1,010,585
2035	0	\$299,510	\$90,000	\$802,086
2036	0	\$0	\$90,000	\$892,888
2037	0	\$0	\$90,000	\$983,781
2038	0	\$0	\$90,000	\$1,074,764
2039	0	\$214,500	\$90,000	\$951,339
2040	0	\$0	\$90,000	\$1,042,291
2041	0	\$0	\$90,000	\$1,133,333
2042	0	\$0	\$90,000	\$1,224,466
2043	0	\$0	\$90,000	\$1,315,691
2044	0	\$0	\$90,000	\$1,407,006
2045	0	\$1,470,410	\$90,000	\$28,003
2046	0	\$0	\$90,000	\$118,031
2047	0	\$0	\$90,000	\$208,149
2048	0	\$0	\$90,000	\$298,358
2049	0	\$0	\$90,000	\$388,656
2050	0	\$0	\$90,000	\$479,045
2051	0	\$0	\$90,000	\$569,524
				\$385,000

City of Bangor	2024		
CAPITAL IMPROVEMENT PROJECTS SUMMARY		PERCENT DOWNPAYMENT	10%
CAPITAL IMPROVEMENT IDEAS WERE GENERATED FROM			

MRWA DOES NOT RECOMMEND OR SUGGEST FINANCING OPTIONS. IT IS UP TO THE COMMUNITY AND THEIR ADVOCATES TO DECIDE WHAT FINANCING OPTIONS WORK BEST FOR THEM AND THEIR FUTURE PROJECTS.

ENTER ITEMS ON THIS PAGE FIRST - THEN SEE INDIVIDUAL PAGES FOR ENTERING DETAILS ON EACH PROJECT -

CAPITAL PROJECTS - FOR DETAILS OF EACH PROJECT SEE INDIVIDUAL PAGES	ESTIMATED PROJECT COST	CASH CONTRIBUTION FROM RATES	AMOUNT FINANCED	COMPLETE IN YEAR OF	IS THIS YEAR FLEXIBLE?	MONEY NEEDED ANNUALLY
GETMAN LIFT STATION REPLACEMENT	\$500,000	\$500,000	\$0	2044		\$25,000
PIPE LINING FOR I&I IMPROVEMENTS	\$2,000,000	\$2,000,000	\$0	2044		\$100,000
			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
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			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
			\$0			\$0
	\$2,500,000	\$2,500,000	\$0			\$125,000

CAPITAL IMPROVEMENT RUNNING BALANCE PROJECTIONS & ANNUAL FUNDING			
ANNUAL COST OF LIVING INCREASE TO PROJECTS		2.00%	
RESERVE BALANCE APPLIED TO CAPITAL IMPROVEMENTS		\$0	
AVG. INTEREST RATE IN SAVINGS		0.00%	
IF AN ANNUAL COLA RATE ADJUSTMENT PERCENT OF		2.00%	
<p>RUNNING BALANCE COLUMN REFLECTS THIS FUND ONLY. THE AVERAGE ANNUAL FUNDING DOES NOT REFLECT ANY EXTRA REVENUE GENERATED BY FUTURE ANNUAL RATE INCREASES. FOR A TRUE RUNNING BALANCE OF THE OVERALL HEALTH OF THE WATER SYSTEM SEE THE 10 YEAR</p>			
YEAR	ANNUAL EXPENDITURES	AVERAGE ANNUAL FUNDING AMOUNT IN RATE BUDGET	RUNNING BALANCE
2024	\$0		\$0
2025	\$0	\$0	\$0
2026	\$0	\$0	\$0
2027	\$0	\$0	\$0
2028	\$0	\$0	\$0
2029	\$0	\$0	\$0
2030	\$0	\$0	\$0
2031	\$0	\$0	\$0
2032	\$0	\$0	\$0
2033	\$0	\$0	\$0
2034	\$0	\$0	\$0
2035	\$0	\$0	\$0
2036	\$0	\$0	\$0
2037	\$0	\$0	\$0
2038	\$0	\$0	\$0
2039	\$0	\$0	\$0
2040	\$0	\$0	\$0
2041	\$0	\$0	\$0
2042	\$0	\$0	\$0
2043	\$0	\$0	\$0
2044	\$3,500,000	\$0	(\$3,500,000)

CITY OF BANGOR
WASTEWATER RATE
CALCULATION REPORT

PAGE #

<u>24</u>	<u>CONCLUDING PAGES - RESULTS OF RATE EVALUATION INDEX</u>
25	FINAL ANALYSIS RATE CALCULATION - CURRENT FISCAL YEAR
26	SUMMARY OF NEW CHARGES "ALL ENTITIES"
27	10 YEAR PROJECTIONS - SUMMARY
28	10 YEAR PROJECTIONS - REVENUES
29	10 YEAR PROJECTIONS - EXPENSES
30	CONCLUSION OF ANALYSIS
31	TYPICAL CUSTOMER BILL
32	CONFIRMATION OF INCOME YEAR 1

MICHIGAN RURAL WATER ASSOCIATION RATE EVALUATION PROGRAM

FINAL ANALYSIS RATE CALCULATION - CURRENT FISCAL YEAR		2024				RTS CHARGE		VOLUME CHARGE	
City of Bangor		ANNUAL BUDGET		PERCENT FIXED EXPENSES	ASSIGNED AS FIXED EXPENSES	COST PER METER EQUIVALENT	ASSIGNED AS VARIABLE EXPENSES	\$ COST PER 100 CUBIC FEET	
EXPENSES		\$362,050		18%	\$66,215	\$5.96	\$295,835	\$4.529	
OPERATION & MAINTENANCE EXPENSES		\$362,050			\$66,215	\$5.96	\$295,835	\$4.529	
DEBT - PRINCIPAL & INTEREST ANNUAL PAYMENTS									
2006 Sewer Loan		\$131,175		100%	\$131,175	\$11.81	\$0	\$0.00	
NEW ANTICIPATED CAPITAL LOANS		\$0		100%	\$0	\$0.00	\$0	\$0.00	
ANNUAL DEBT PAYMENTS PRINCIPAL & INTEREST		\$131,175			\$131,175	\$11.81	\$0	\$0.00	
ANNUAL O & M + DEBT		\$493,225			\$197,390	\$17.78	\$295,835	\$4.53	
NON SALES INCOME		\$0			\$0	0.000	\$0	0.000	
REVENUE COLLECTED THROUGH RATES		\$493,225			\$197,390		\$295,835		
CALCULATED RATE O & M + DEBT		METER EQUIVALENT		MONTH		\$17.78		\$4.53	
CURRENT RATE						\$5.00		\$6.93	
INCREASE						\$12.78		(\$2.40)	
PERCENT INCREASE						256%		-35%	
OVERALL PERCENT INCREASE FOR GALLONS OF		4,000		50%					
RESERVES									
EQUIPMENT REPLACEMENT AVERAGE ANNUAL BUDGETED AMOUNT		\$45,000		18%	\$8,230	\$0.74	\$36,770	\$0.56	
EQUIPMENT REPLACEMENT PAGE 2		\$90,000		18%	\$16,460	\$1.48	\$73,540	\$1.13	
EQUIPMENT REPLACEMENT & RESERVE REQUIREMENTS		\$135,000			\$24,690	\$2.22	\$110,310	\$1.69	
CAPITAL IMPROVEMENT AVERAGE ANNUAL BUDGETED AMOUNT		\$0		18%	\$0	\$0.00	\$0	\$0.00	
PREP FOR FUTURE LOAN		\$0			\$0				
BUDGETED ADDITIONAL REVENUE FROM VOLUME SALES		\$0					\$0	\$0.00	
CAPITAL + ADDITIONAL FUNDING		\$0			\$0	\$0.00	\$0	\$0.00	
CAPITAL + EQUIPMENT & RRI RESERVES		\$135,000			\$24,690	\$2.22	\$110,310	\$1.69	
ADOPTED BUDGET		\$628,225			\$222,080		\$406,145		
REVENUE COLLECTED CALCULATED RATES		\$628,225		18.29%	\$222,080		\$406,145		
REVENUE COLLECTED CURRENT RATES		\$506,649							
CALCULATED RATE PER METER EQUIVALENT				PER MONTH		\$20.00	RATE PER 100 CUFT		\$6.22
ANNUAL METER EQUIVALENTS / REU'S COUNT 11,104				CURRENT RATES		\$5.00			\$6.93
ANTICIPATED EQUIVALENT GALLONS / UNITS 65,327				PERCENT INCREASE		300.0%			-10.3%
INVOICES PER YEAR 12				INCREASE OF		\$15.00			(\$0.71)
NOTES PERCENT RESERVE 21.5%									

2024

SUMMARY OF NEW CHARGES "ALL ENTITIES"

City of Bangor					Township Customers	
	CURRENT	NEW	DIFFERENCE		CURRENT	NEW
PER 100 CUFT	\$6.93	\$6.22	-\$0.71		\$13.86	\$12.43
2024	CURRENT	NEW	DIFFERENCE PER MONTH		CURRENT	NEW
METER SIZE IN INCHES	READY TO SERVE PER MONTH	READY TO SERVE PER MONTH	METER RATIO FACTOR - REU'S PER METER SIZE		READY TO SERVE PER MONTH	READY TO SERVE PER MONTH
3/4	\$5.00	\$20.00	1.00	\$15.00	\$10.00	\$40.00
1	\$5.00	\$33.33	1.67	\$28.33	\$10.00	\$66.67
1 1/2	\$5.00	\$66.67	3.33	\$61.67	\$10.00	\$133.33
2	\$5.00	\$106.67	5.33	\$101.67	\$10.00	\$213.33
3	\$5.00	\$200.00	10.00	\$195.00	\$10.00	\$400.00
4	\$5.00	\$333.33	16.67	\$328.33	\$10.00	\$666.67
6	\$5.00	\$666.67	33.33	\$661.67	\$0.00	\$1,333.33

These are the rates calculated for each meter size. Also for the cost per unit of water sold for each entity.

CALCULATED REVENUE		PERCENT INCREASE ON "RTS"									
		2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	
		YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 6	YEAR 7	YEAR 8	YEAR 9	YEAR 10
CALCULATED RATE CHARGE PER "METER EQUIVALENT" / REU	\$20.00	\$20.40	\$20.81	\$21.22	\$21.65	\$22.08	\$22.52	\$22.97	\$23.43	\$23.90	
ANNUAL METER EQUIVALENTS / REU'S COUNT	11,104	11,104	11,104	11,104	11,104	11,104	11,104	11,104	11,104	11,104	
REVENUE FROM METER EQUIVALENT CHARGE (RTS)	\$222,080.00	\$226,521.60	\$231,052.03	\$235,673.07	\$240,386.53	\$245,194.26	\$250,098.15	\$255,100.11	\$260,202.12	\$265,406.16	
		PERCENT INCREASE ON COST PER UNIT									
		2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	
CALCULATED RATE CHARGE PER UNIT OF WATER / SEWER	\$6.22	\$6.34	\$6.47	\$6.60	\$6.73	\$6.86	\$7.00	\$7.14	\$7.28	\$7.43	
REVENUE FROM VOLUME SALES	\$406,145.00	\$414,267.90	\$422,553.26	\$431,004.32	\$439,624.41	\$448,416.90	\$457,385.24	\$466,532.94	\$475,863.60	\$485,380.87	
NON-SALES / OTHER REVENUE											
TOTAL NON-SALES & OTHER INCOME	\$563,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
TOTAL NON-SALES & OTHER INCOME APPLIED TO WATER BUDGET	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
TOTAL COMBINED REVENUE	\$628,225	\$640,790	\$653,605	\$666,677	\$680,011	\$693,611	\$707,483	\$721,633	\$736,066	\$750,787	

EXPENSES	BUDGET FOR FISCAL YEARS STARTING					2029	2030	2031	2032	2033
	2024	2025	2026	2027	2028					
	PERCENT INCREASE (COST OF LIVING ETC) <i>ON BUDGET</i>									
EXPENSES		2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%
EXPENSES	\$362,050	\$369,291	\$376,677	\$384,210	\$391,895	\$399,732	\$407,727	\$415,882	\$424,199	\$432,683
TOTAL O&M EXPENSES	\$362,050	\$369,291	\$376,677	\$384,210	\$391,895	\$399,732	\$407,727	\$415,882	\$424,199	\$432,683
DEBT EXPENSES - PRINCIPAL & INTEREST		2025	2026	2027	2028	2029	2030	2031	2032	2033
2006 Sewer Loan	\$131,175	\$129,143	\$132,112	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<i>NEW ANTICIPATED CAPITAL LOANS</i>										
\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
ANNUAL DEBT PAYMENTS PRINCIPAL & INTEREST	\$131,175	\$129,143	\$132,112	\$0	\$0	\$0	\$0	\$0	\$0	\$0
NEW BUDGET LINE ITEMS STARTING YEAR 2			\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
NEW BUDGET LINE ITEMS STARTING YEAR 2			\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
MINIMUM REQUIRED EXPENSES / BUDGET	\$493,225	\$498,434	\$508,789	\$384,210	\$391,895	\$399,732	\$407,727	\$415,882	\$424,199	\$432,683
GAINS / LOSSES <i>BEFORE</i> EQUIPMENT & CAPITAL EXPENSES	\$135,000	\$142,356	\$144,816	\$282,467	\$288,116	\$293,879	\$299,756	\$305,751	\$311,866	\$318,104
EQUIPMENT REPLACEMENT ANTICIPATED ACTUAL EXPENDITURES	\$0	\$324,615	\$5,200	\$165,360	\$0	\$0	\$0	\$0	\$180,960	\$0
CAPITAL IMPROVEMENT <i>ANTICIPATED EXPENDITURES</i>	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
TOTAL COMBINED EQUIPMENT & CAPITAL ACTICIPATED EXPENDITURES	\$0	\$324,615	\$5,200	\$165,360	\$0	\$0	\$0	\$0	\$180,960	\$0
TOTAL ANTICIPATED ACTUAL CASH ANNUAL EXPENDITURES	\$493,225	\$823,049	\$513,989	\$549,570	\$391,895	\$399,732	\$407,727	\$415,882	\$605,159	\$432,683
GAINS / LOSS FOR FISCAL YEAR - <i>AFTER</i> EQUIPMENT & CAPITAL EXPENDITURES	\$135,000	-\$182,260	\$139,616	\$117,107	\$288,116	\$293,879	\$299,756	\$305,751	\$130,906	\$318,104
<i>STARTING</i> CASH AVAILABLE / BANK BALANCE	\$3,393,509									
<i>ENDING</i> CASH AVAILABLE / BANK BALANCE	\$3,528,509	\$3,346,250	\$3,485,866	\$3,602,973	\$3,891,089	\$4,184,968	\$4,484,724	\$4,790,476	\$4,921,382	\$5,239,486

City of Bangor			
COST PER	CURRENT RATES	CALCULATED RATES	DIFFERENCE
100 CUFT	\$6.93	\$6.217	(\$0.71)
READY TO SERVE (RTS) CHARGES PER MONTH			
METER SIZE IN INCHES	CURRENT RATES	CALCULATED RATES	DIFFERENCE
3/4	\$5.00	\$20.000	\$15.00
1	\$5.00	\$33.33	\$28.33
1 1/2	\$5.00	\$66.67	\$61.67
2	\$5.00	\$106.67	\$101.67
3	\$5.00	\$200.00	\$195.00
4	\$5.00	\$333.33	\$328.33
6	\$5.00	\$666.67	\$661.67
8	\$5.00	\$20.00	\$15.00

The above rates are based on an input budget of \$628,225
The above rates are based on invoicing the following gallons of water / sewer 6,416,878
The above rates are based on the following number of customers 776
The above rates are based on the following number of Residential Equivalent Units (REU's) 11,104

If all numbers listed above stay true the new calculated rates will generate the input budget "exactly". Not a penny more or a penny less.

This Rate Analysis uses "Full Cost Pricing" to determine the user fees.

The above table shows the Current Rate, the new Calculated Rate, and the difference between the current and new rate changes.

Full Cost Pricing Is:

- Maintaining your system's financial stability by ensuring a sufficient revenue stream.
- Collect and reserve the funds needed to cover the costs of future asset rehabilitation and compliance with future regulations, among other things.
- Plan ahead for reasonable, gradual rate increases when necessary.
- Deliver a fair priced, high-quality drinking water to your customers now and in the future.

NOTE:
The above CALCULATED RATES will generate only enough to meet the current budget input into the rate analysis program. In order to charge a lesser amount, the budget must first be reduced.

TYPICAL BILL COMPARISON USING NEW RATES								
<i>City of Bangor</i>								
		<u>CURRENT RATES</u>	<u>NEW / CALCULATED RATES</u>					
		RTS	\$5.00	\$20.00				
		COST PER UNIT	\$6.93	\$6.22				
		COST PER UNIT OF WATER	\$6.22	MONTHLY				
								\$ PER 100 CUFT
METER SIZE IN INCHES	CUBIC FT USED	VOLUME CHARGE	BASE RATE CHARGE	NEW BILL	OLD BILL	CHANGE IN BILL	PERCENT INCREASE	
3/4	100	\$6.22	\$20.00	\$26.22	\$11.93	\$14.29	119.8%	
3/4	300	\$18.65	\$20.00	\$38.65	\$25.79	\$12.86	49.9%	
3/4	450	\$27.98	\$20.00	\$47.98	\$36.19	\$11.79	32.6%	
3/4	600	\$37.30	\$20.00	\$57.30	\$46.58	\$10.72	23.0%	
3/4	1,000	\$62.17	\$20.00	\$82.17	\$74.30	\$7.87	10.6%	
1	5,000	\$310.85	\$33.33	\$344.19	\$351.50	(\$7.31)	-2.1%	
1 1/2	7,500	\$466.28	\$66.67	\$532.95	\$524.75	\$8.20	1.6%	
2	20,000	\$1,243.42	\$106.67	\$1,350.08	\$1,391.00	(\$40.92)	-2.9%	
3	30,000	\$1,865.13	\$200.00	\$2,065.13	\$2,084.00	(\$18.87)	-0.9%	
4	40,000	\$2,486.84	\$333.33	\$2,820.17	\$2,777.00	\$43.17	2%	
6	50,000	\$3,108.54	\$666.67	\$3,775.21	\$3,470.00	\$305.21	9%	
8	500,000	\$31,085.45	\$20.00	\$31,105.45	\$34,655.00	(\$3,549.55)	-10%	
GALLONS INCLUDED MIN BILL				0	0			

This page provides confirmation of income based on the results of the rate analysis, if the calculated rates below are adopted. It only applies to this current or upcoming fiscal year. See five year projections for additional information.			
CONFIRMATION OF INCOME - BASED ON CALCULATED RATES			
City of Bangor		RATE CLASS 2	2024
	City of Bangor	Township Customers	REVENUE
	New Cost per Unit of Water Sold		NEW RATES
\$ PER 100 CUFT	\$6.217	\$12.434	
UNITS Sold	63,010	1,158	64,169
Income	\$391,741	\$14,404	\$406,145
NON SALES INCOME APPLIED TO VARIABLE BUDGET			\$0
TOTAL ANTICIPATED REVENUE PER UNIT SALES			\$406,145
METER SIZE	NEW BASE RATE PER MONTH		
3/4	\$20.000	\$40.000	
NO. CUSTOMERS	714	21	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	8,568	252	
INCOME	\$171,360.00	\$10,080.00	\$181,440
1	\$33.33	\$66.67	
NO. CUSTOMERS	24	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	288	0	
INCOME	\$9,600.00	\$0.00	\$9,600
1 1/2	\$66.67	\$133.33	
NO. CUSTOMERS	0	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	0	0	
INCOME	\$0.00	\$0.00	\$0
2	\$106.67	\$213.33	
NO. CUSTOMERS	13	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	156	0	
INCOME	\$16,640.00	\$0.00	\$16,640
3	\$200.00	\$400.00	
NO. CUSTOMERS	1	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	12	0	
INCOME	\$2,400.00	\$0.00	\$2,400
4	\$333.33	\$666.67	
NO. CUSTOMERS	3	0	
INVOICES PER YEAR	12	12	
ANNUAL INVOICES	36	0	
INCOME	\$12,000.00	\$0.00	\$12,000
Fixed Income			\$222,080
NON SALES INCOME APPLIED TO FIXED BUDGET			\$0
TOTAL ANTICIPATED REVENUE BASE RATE / RTS + NONE SALES INCOME			\$222,080
TOTAL COMBINED CUSTOMER INCOME = BASE RATE + VOLUME INCOME			\$628,225
TOTAL COMBINED CUSTOMER INCOME			\$628,225
Budget Goal			\$628,225
Difference			\$0