

369 East Park Drive Harrisburg, PA 17111 (717) 564-1121 www.hrg-inc.com

	MARCH 2018
	CHAPTER 94 WASTELOAD MANAGEMENT REPORT FOR CALENDAR YEAR 2017 HALIFAX AREA WATER AND SEWER AUTHORITY DAUPHIN COUNTY, PENNSYLVANIA
	HRG Project No. 001650.0425

SECTION 1	Chapter 94 Municipal Wasteload Management Annual Report - CY 2017
SECTION 2	Attachments to Chapter 94 Wasteload Management Report
	Attachment A – DEP Chapter 94 Spreadsheet
	Hydraulic Loading Graph
	Organic Loading Graph
	Attachment B – Sanitary Sewer System General Plan/Extensions
	Attachment C – Condition of Pump Stations
	Pump Hours – Boyer Street Pumping Station
	Pump Hours – Main Pumping Station
	Attachment D – Sewage Sludge Management Inventory
	Attachment E – Flow Meter Calibration Report
	Attachment F – Corrective Action Plan Update



CHAPTER 94 MUNICIPAL WASTELOAD MANAGEMENT ANNUAL REPORT

For Calendar Year: 2017

Permittee is owner and/or operator of a POTW or other sewage treatment facility

Permittee is owner and/or operator of a collection system tributary to a POTW not owned/operated by permittee

	GENERAL INFORMATION						
Pe	Permittee Name: Halifax Area Water and Sewer Authority Permit No.: PA0024457						
Ма	iling Address:	PO Box 443	Effective Date:	May 1, 2017			
Cit	y, State, Zip:	Halifax, PA 17032	Expiration Date:	April 30, 2022			
Со	ntact Person:	Jeffrey Grosser	Renewal Due Date:	November 1, 2021			
Titl	e:	Operator	Municipality:	Halifax Borough, Halifax Twp			
Ph	one:	717-896-3886	County:	Dauphin			
Em	ail:	jgrosser@hawasaonline.com	Consultant Name:	Herbert, Rowland & Grubic, Inc.			
		CHAPTER 94 REPORT	COMPONENTS				
1.	Attach to this report 5 years and project design capacity per Check the approp Line graph for f DEP Chapter 9 Section 1 is not	t a line graph depicting the monthly avera tring the flows for the next 5 years. The r the WQM permit. (25 Pa. Code § 94.12(riate boxes: flows attached (Attachment A) 4 Spreadsheet used (Attachment A) t applicable (report is for a collection syste	ge flows (expressed in l e graph must also inclu <u>a)(1)</u>) em).	MGD) for each month for the past ide a line depicting the hydraulic			
2.	 Attach to this report a line graph depicting the monthly average organic loads (express as lbs BOD5/day) for each month for the past 5 years and projecting the organic loads for the next 5 years. The graph must also include a line depicting the organic design capacity of the treatment plant per the WQM permit. (25 Pa. Code § 94.12(a)(2)) Check the appropriate boxes: 						
3.	 If the DEP Chapter 94 Spreadsheet was not used to determine projections, discuss the basis for the hydraulic and organic projections. In all cases, include a description of the time needed to expand the plant to meet the load projections, if necessary, and data used to support the projections should be included in an appendix to this report. (25 Pa. Code § 94.12(a)(3)) Based on the projected hydraulic and organic loadings for the next five years, no overload is expected at the Halifax WWTP. 						

4. Attach a map showing all sewer extensions constructed within the past calendar year, sewer extensions approved or exempted in the past year in accordance with Act 537 and Chapter 71, but not yet constructed, and all known proposed projects which require public sewers but are in the preliminary planning stages. The map must be accompanied by a list summarizing each extension or project and the population to be served by the extension or project. If a sewer extension approval or proposed project includes schedules describing how the project will be completed over time, the listing should include that information and the effect this build-out-rate will have on populations served. (25 Pa. Code § 94.12(a)(4))

Check the appropriate boxes:

- Map showing sewer extensions constructed, approved/exempted but not yet constructed, and proposed projects attached (Attachment B)
 - List summarizing each extension or project attached (Attachment B)
 - Schedules describing how each project will be completed over time and effects attached (Attachment B)

Comments:

No extensions to the Authority's collection system were approved or exempted in 2017. New connections served by the Authority in 2017 include the Mid Penn Bank located at 3583 and 3589 Peters Mountain Road (1 EDU) and a single family dwelling located on Fellowship Drive replacing an on-lot disposal system (1 EDU). In 2018, a planning module exemption was submitted for the proposed Members 1st Federal Credit Union (1 EDU) and for the future development of an adjacent vacant lot (1 EDU) at the intersection of S.R. 225 and S.R. 147. All of the new connections and proposed developments mentioned above are located in Halifax Township and are outside of the current connection restriction established by the Authority's June 20, 2017 Corrective Action Plan.

Halifax Township is currently preparing an Act 537 Sewage Facilities Plan which will evaluate extensions to the Authority's collection system which would likely extend beyond 5 years in the future and will include the extension of sewer to areas currently served by on-lot disposal systems.

There are minimal connections proposed to the Authority's collection system in the 5-year planning period, with only 2 new connections within the existing service area anticipated per year prior to any future sewer extensions which may be contemplated by the Halifax Township Act 537 Plan.

5. Discuss the permittee's program for sewer system monitoring, maintenance, repair and rehabilitation, including routine and special activities, personnel and equipment used, sampling frequency, quality assurance, data analyses, infiltration/inflow monitoring, and, where applicable, maintenance and control of combined sewer regulators during the past year. Attach a separate sheet if necessary. (25 Pa. Code § 94.12(a)(5))

Analysis of WWTP influent, effluent and sludge was conducted at minimum permit frequencies through certified lab(s). The plant operator completes the daily samples such as pH, dissolved oxygen and chlorine residual. All other testing is contracted to Microbac Laboratories. Additional influent monitoring was completed between September 2017 and December 2017 in order to obtain influent flow characteristics needed to evaluate future upgrades to the Authority's wastewater treatment plant.

Repairs to the Authority's collection system are conducted on an as-needed basis. There are 2 full-time operators of the sewer system, shared with the water system. The collection system maintenance program consists of daily checks on the Authority's pump station and routine checks on manholes throughout the collection system. Manhole inserts have been placed in manholes that appear to be affected by inflow. As part of the June 20, 2017 Corrective Action Plan, the Authority's operators installed portable area-velocity meters at three (3) locations throughout the collection system to aid in the review of sewage flows to the wastewater treatment plant as needed for the evaluation of upgrade alternatives. No serious problems have been observed in the collection system. The system is not a combined sewer system and no regulators are present.

WWTP Upgrades are currently being evaluated by the Authority as part of the June 20, 2017 Corrective Action Plan, approved by PA DEP on August 8, 2017.

6. Discuss the condition of the sewer system including portions of the system where conveyance capacity is being exceeded or will be exceeded in the next 5 years and portions where rehabilitation or cleaning is needed or is underway to maintain the integrity of the system and prevent or eliminate bypassing, CSOs, SSOs, excessive infiltration and other system problems. Attach a separate sheet if necessary. (25 Pa. Code § 94.12(a)(6))

Check the appropriate boxes:

- System experienced capacity-related bypassing, SSOs or surcharging during the report year. On a separate sheet, list the date, location, and reason for each bypass, SSO or surcharge event.
- System did not experience capacity-related bypassing, SSOs or surcharging during the report year.

Comments:

No serious conditions were observed in the collection system and there were no known SSOs. Improvements to the Main Pumping Station at the WWTP are being considered as part of the WWTP Upgrade project mentioned below.

Corrective Action Plan (CAP) - Consent Order and Agreement (COA) Update:

HAWASA submitted a revised Corrective Action Plan dated June 20, 2017 to address the hydraulic overload condition at the main pumping station at the WWTP, which was approved by PA DEP on August 8, 2017. The hydraulic overload condition will be eliminated as part of a WWTP upgrade project which is currently being evaluated by the Authority as part of the CAP.

In response to the draft Consent Order and Agreement (COA) issued by PA DEP on January 10, 2018 for WWTP effluent violations occurring between March 2013 and September 2017, HAWASA submitted a formal comment letter dated January 31, 2018 requesting revisions to the draft COA. The Authority's engineering consultant is currently preparing the draft Design Engineer's Report and Uniform Environmental Report for the WWTP Upgrade project and has met with equipment manufacturers to review process treatment alternatives for the project. Alternatives under review for the new WWTP process include <u>Main Pumping Station improvements</u>, Screenings addition, Biological Nutrient Removal (BNR) process improvements, Ultraviolet Light (UV) Disinfection, and solids processing – aerobic sludge digestion improvements.

Attach a discussion on the condition of sewage pumping (pump) stations. Include a comparison of the maximum pumping rate with present maximum flows and the projected 2-year maximum flows for each station. (25 Pa. Code § 94.12(a)(7))

Check the appropriate boxes:

- The collection system does not contain pump stations
- ☑ The collection system does contain pump stations (Number 2)
- Discussion of condition of each pump station attached (Attachment C)

Г

8.	lf t info	he sewage collection system receives industrial wastes (i.e., non-sanitary wastes), attach a report with the prmation listed below. (<u>25 Pa. Code § 94.12(a)(8)</u>)
	a.	A copy of any ordinance or regulation governing industrial waste discharges to the sewer system or a copy of amendments adopted since the initial submission of the ordinance or regulation under Chapter 94, if it has not previously been submitted.
	b.	A discussion of the permittee's or municipality's program for surveillance and monitoring of industrial waste discharges into the sewer system during the past year.
	C.	A discussion of specific problems in the sewer system or at the plant, known or suspected to be caused by industrial waste discharges and a summary of the steps being taken to alleviate or eliminate the problems. The discussion shall include a list of industries known to be discharging wastes which create problems in the plant or in the sewer system and action taken to eliminate the problem or prevent its recurrence. The report may describe pollution prevention techniques in the summary of steps taken to alleviate current problems caused by industrial waste dischargers and in actions taken to eliminate or prevent potential or recurring problems caused by industrial waste dischargers.
	Ch	eck the appropriate boxes:
	Ц	Industrial waste report as described in 8 a., b. and c. attached (Attachment)
		industrial pretreatment report as required in an NPDES permit attached (Attachment)
9.	Exi	sting or Projected Overload.
	Ch	eck the appropriate boxes:
	\boxtimes	This report demonstrates an existing hydraulic overload condition. At the WWTP main pumping station only
		This report demonstrates a projected hydraulic overload condition.
		This report demonstrates a projected organic overload condition.
	lf o or ove	ne or more boxes above have been checked, attach a Corrective Action Plan (CAP) to reduce or eliminate present projected overloaded conditions under §§ 94.21 and/or 94.22 (relating to existing overload and projected erload). (25 Pa. Code § 94.12(a)(9))
	\boxtimes	Corrective Action Plan attached (Attachment F)
10.	Wh bal	ere required by the NPDES permit, attach a Sewage Sludge Management inventory that demonstrates a mass ance of solids coming in and leaving the facility over the previous calendar year.
	\boxtimes	Sewage Sludge Management Inventory attached (Attachment D)
11.	For cor	facilities with CSOs and where required by the NPDES permit, attach an Annual CSO Report (including satellite nbined sewer systems).
		Annual CSO Report attached (Attachment)
12.	For bee	POTWs, attach a calibration report documenting that flow measuring, indicating and recording equipment has en calibrated annually. (<u>25 Pa. Code § 94.13(b)</u>)
	\boxtimes	Flow calibration report attached (Attachment E)

٦

3800-FM-BPNPSM0XXX 8/2013 **Chapter 94 Report Instructions**

RESPONSIBLE OFFICIAL CERTIFICATION

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 gathered and evaluated 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 knowledge of violations. See 18 Pa. C.S. § 4904 (relating to unsworn falsification).

C - Jeff 9.

Fred L. Ford, Jr., Chairman

Name of Responsible Official

717-896-3886

Telephone No.

Signature

20/201

PREPARER CERTIFICATION

I certify under penalty of law that this document and all attachments were prepared by me or otherwise under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. 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 knowledge of violations. See 18 Pa. C.S. § 4904 (relating to unsworn falsification).

Justin J. Mendinsky, P.E.

Name of Preparer

717-564-1121

Telephone No.

Du	t Aller	aut,	
Signature	17	A	
1 2	115/2010	9	
Dato	115 Joeun	2	

Date



penn	sylvania	a			PADEP C	hapter 94 Spreads	sheet				
DEPARTME	NT OF ENVIRON	MENTAL			Sewa	age Treatment Plai	nts			Reporting Year:	2017
								т			
Facility Name:	Halifax Wast	ewater Treatm	ent Plant			Permit No.: P/	40024457	1		Persons/EDU:	3.5
Existing Hydraulic	: Design Capa	city:	0.21 M	GD		Existing Organic De	esign Capaci	ity:	527	lbs BOD5/day	
Upgrade Planned	in Next 5 Yea	rs?		Year:		Upgrade Planned in	Next 5 Year	s?	YES	Year:	2021
Future Hydraulic	Design Capac	ity:	M	GD		Future Organic Des	ign Capacity	<i>r</i> :	527	lbs BOD5/day	
	Mon	thiv Average I	Flows for Pas	t Five Years (MGD)		Monthly	Average BC	DD5 Loads fo	or Past Five Years	s (lbs/dav)
Month	2013	2014	2015	2016	2017	Month	2013	2014	2015	2016	2017
January	0.098	0.0866	0.0774	0.0902	0.0787	January	90	96	136	380	99
February	0.101	0.0822	0.0691	0.1269	0.0819	February	163	140	101	325	86
March	0.103	0.102	0.0976	0.1153	0.0906	March	105	155	142	253	105
April	0.102	0.1446	0.1123	0.1062	0.122	April	166	153	199	190	297
May	0.105	0.1525	0.121	0.1173	0.1128	May	133	241	347	262	197
June	0.115	0.1541	0.129	0.1239	0.1168	June	15	317	513	303	197
July	0.116	0.1284	0.1264	0.1244	0.1444	July	179	362	317	328	106
August	0.108	0.1155	0.1181	0.1198	0.1456	August	181	200	171	208	220
September	0.104	0.1117	0.11	0.1038	0.122	September	157	168	357	152	257
October	0.109	0.1009	0.0985	0.0915	0.1047	October	158	190	273	466	193
November	0.096	0.0832	0.0924	0.0784	0.0914	November	185	156	100	175	221
December	0.102	0.095	0.0996	0.0765	0.0748	December	157	153	147	148	110
	0 105	0 1121	0 1042	0 1062	0 1071		1/1	104	224	266	174
Max 3-Mo Ave	0.105	0.1131	0.1043	0.1002	0.1071	Max Mo Ava	141	194	204	200	207
Max : Avg Ratio	1.08	1 33	1 20	1 16	1 28	Max : Ava Ratio	1 31	1.86	2 20	1 75	1 71
Existing EDUs	737.0	739.0	739.0	749.0	751.0	Evicting EDUc	737	730	2.20	749	751
	142.5	153.0	141 1	141.8	142.6		0 191	0.263	0 316	0 355	0 232
Flow/Capita (GPD)	40.7	43.7	40.3	40.5	40.7	Load/Capita	0.055	0.075	0.090	0.000	0.202
Exist Overload?	NO	NO	NO	NO	NO	Exist Overload?	NO	NO	NO	NO	NO

Projected Flows for Next Five Years (MGD)

	2018	2019	2020	2021	2022
New EDUs	2.0	2.0	2.0	2.0	2.0
New EDU Flow	0.0003	0.0003	0.0003	0.0003	0.0003
Proj. Annual Avg	0.1074	0.1077	0.108	0.1083	0.1086
Proj. Max 3-Mo Avg	0.1299	0.1302	0.1306	0.131	0.1313
Proj. Overload?	NO	NO	NO	NO	NO

Show Precipitation Data on Hydraulic Graph?

	Total Monthly Precipitation for Past Five Years (Inches)					
Month	2013	2014	2015	2016	2017	
January				2.0		
February				3.5		
March				1.6		
April				1.7		
May				5.15		
June				2.75		
July				4.8		
August				1.35		
September				2.05		
October				1.5		
November				1.5		
December				3.2		

	Projec	Projected BOD5 Loads for Next Five Years (lbs/day)					
2018 2019 2020 2021							
New EDUs	2	2	2	2	2		
New EDU Load	0.543	0.543	0.543	0.543	0.543		
Proj. Annual Avg	202	203	203	204	204		
Proj. Max Avg	357	358	359	360	361		
Proj. Overload?	NO	NO	NO	NO	NO		









COMPUTER DRAWING FILE NAME:



CONDITION OF THE PUMP STATIONS

HAWSA utilizes two (2) pump stations throughout the sanitary sewer system. The pump stations are maintained and inspected by the operators on a regular basis. Cleaning, repairs, and routine maintenance items are performed as needed.

Boyer Street Pumping Station - Location: Boyer Street, Halifax Township

Design Capacity:	50 gpm (1 pump basis)
Present Flows:	Average: 0.6 gpm
	Maximum (Peak Hourly Flow estimated): 50 gpm
	Projected two-year maximum peak hourly flow estimated: 50 gpm
	(design basis of new Boyer Street Pump Station for maintaining velocity
	in 4-inch force main)

The Boyer Street Pump Station was upgraded to submersible pumps at the end of 2014 and began operations in 2015. The single phase pumps run full speed. Attached runtime records indicate total runtime for the station is typically around 2 hours per week, usually divided equally between the pumps.

There are no known future connections to the pump station in the next 2-year planning period. Therefore, a hydraulic overload condition is not expected to occur at the pump station in the next 2 years.

<u>Main Pumping Station</u> - Location: At the Treatment Plant, conveying all flow from the Borough and the northern Halifax Township service area (including flows from Boyer Street Pumping Station).

There are two (2) suction lift pumps with separate 4-inch suction lines, discharging into a single 4-inch force main. The pumps are variable speed based on use of variable frequency drives, so only maximum flows can be estimated based on runtime. Due to the small size of the force main, 2 pumps on represents a much lower flow rate than twice one-pump flow.

The recorded pump hours attached indicate an overloaded pump station condition. In accordance with the existing Corrective Action Plan (CAP) and draft Consent Order and Agreement (COA) developed for the WWTP, improvements to the Main Pumping Station are currently being evaluated and will be addressed as part of the WWTP Upgrade project. See Attachment F for information regarding the CAP and COA status.

Design Capacity:	175 gpm (1 pump basis)
Present Flows:	Average: 70 gpm (estimated based on plant flow)
	Maximum (Peak Hourly Flow estimated): 240 gpm
	Projected two-year maximum peak hourly flow estimated: 240 gpm
	(based on effective capacity of 2 pumps together into small 4-inch force main)
	As noted plant return flows are included.

Wastewater from the Halifax School and southern Halifax Township service area flows directly to the headworks. The Peak Hourly Flow at the WWTP is determined to be 360 gpm based on analysis of effluent WWTP flow meter charts for this flow-through treatment plant.



		BOYER	STREET P	UMP STATI	ON	
DATE:	TIME:	PUMP #1	HOURS	PUMP #2	HOURS	TOTAL
10-10-1	6 1100	615.4	-5	375.4	-6	1-1
10-14-1	6 1030	061	.7	376.2	. 8	1.5
16-12-1	60945	616.6	5	376-7	- 5	1.0
10-21-1	6 1030	1017.4	18	377.4	.7	1.5
10-24-1	6 1010	617.9	-5	378	-6	1-2
10-31-1	6 1035	619.	1.2	379.1	1-1	2.3
11-4-16	0 10:45	619.7	.6	379.8	.7	1.3
11-7-1	6 1030	620.2	-5	380-3	.5	1.0
11-11-11	09.55	620.8	.6	380.9	.6	1.2
11-21-11	0 10:05	632.7	1.9	382.6	1.7	3.6
11-2-1	6 10:00	623.5	.8	393.5	.9	1-7
13-1-1	6 10:05	624.7	1.2	384.6	1.1	2.3
13-5-1	6 1035	(p25.2	a 5	395.2	-6	1.1
12-9-11	0 11:00	625.9	.7	385.9	.7	1.4
12-19-1	6 1000	027.5	1.6	3877	1.8	3.4
12-23-16	0/000	628.2	-7	389.6	-9	1.6
= 12-28-1	60645	629	.9	391.5	-9	1-7
1-6-1	9 1010	630.4	1.6	391.3	1.3	3.4
1-12-1	7 1015	631.6	1.0	392-4	1.3	2.3
1-19-1	7 1035	632.0	1-2	394	1.4	2.6
1-23-1	1 1040	033-5	-7	395	1.0	1-7
127-1	7 0935	634-3	. 8	396.4	1-4	2.2
1-30-1	71000	631-9	. 6	397.2	-9	1.4
2-6-1	7 0815	636.4	1.5	398.9	1.7	3.2
2-13-1	1 1045	638	1.6	400.4	1-5	3-1
2-20-1	7 10:20	639.5	1.5	402	1.6	3.1
2-29-1	7 1100	640.5	1-0	402.9	-9	1.9
2-27-	11 1020	641.2	.7	403.6	17	1.4

.

GEN. - 1020 - RUN

		BOYER	STREE	T PUM	IP STATI	ON			-
DATE:	TIME:	PUMP #1	HOURS		PUMP #2	HOURS		TOTAL	
2-28-17	0930	641.5	.3		403.9	.3		-6	
3-6-17	1030	643	1.5		405.5	1.6		3.1	
3-13-17	1030	644.9	1-8		407.1	1.6		3.4	
3-20-17	1045	6A69	2.1		409.1	20		4.1	
3-27-17	1045	649	21		411.4	23		4.4	
3-30-17	10:05	649.8	. 8	0.000	412.1	.7		1.5	
4-5-17	2950	6515	1-7	LIGHT	413.6	1.5	ON	3-2	
4-6-17	1000	651.8	-3		413.8	-2		.5	
4.7-17	1005	652.4	.6		414.4	:6		1102	-
4-10-17	1030	653.3	g		415.5	1.1		2.0	
4-17-17	1030	053-3	2		417.7	2.4		4.4	
4-18-17	1095	655.6	-3		418.2	3		*6	
4-21-17	0950	656.5	. 9		419.1	.9		1.8	-
5-1-17	1030	651.5	3		422-5	3.4		6.4	-
5-9-17	1020	660.4	-9		423.6	I-L		2.0	-
5-9-11	1050	1061-1	1.3		425,1	1-5		x-0	
5-12-17	Q840	63.9	1.2		426.5	1.4		2.6	
5-15-17	1015	463.7	1.0		427.5	1.0		2.0	
5-22-17	1030	665.9	2.0		429.6	2.1		4.1	
5-3017	1000	667-0	4-7	+	431-9	2.7		4.1	
6-5-11	1035	069-2	1-4,		435.1	1-1		3.3	
6-12-11	1030	£10.6	1.4		435.6	1.7		3.3	
6-16-11	1030	671-3	-6	+	436.0	2		1.1	SET Gen 6
6-19-17	1045	672.1	10		437.3	17	and the state of the	1.5	104
12-26-17	1030	414.2	2.1	ļ	737.5	2.2		4.5	SET 1030
7-3-11	0045	616.2	2.0		441.5	2.0		7.0	
1-10-17	1030	670.0	1.0		143.7	dit		4.0	
1-17-11	1050	\$ 18.9	eŢ		474.8	•	L	1.0]

	1. A.		BOYER	STREE	T PUMP STATI	ON	
	DATE:	TIME:	<u>PUMP #1</u>	HOURS	<u>PUMP #2</u>	HOURS	TOTAL
and the second	7-24-17	1030	680.5	1.6	496,3	15	3.1
	7-28-17	0840	681.8	13	447.4	11	2.4
	7-31-17	1020	1082.6	.8	448.2	.8	1.6
	8-4-17	1005	6835	09	449.2	1.0	19
	8-7-17	0940	694-4	9	149 9	7	16
		0110	2968	24	4525	26	50
	Q-2117	1015	689 2	2.4	404 6	2.0	ile
	BALIT	100	690 4	75	1858	2.0	7:7
	83217	1015	6910	id	51/7	q	19
8	12 117	1012	100-	1.0	750-1	o (1.1
	0 1.17	1050	672.5	111	451.0	1.	a.d
	7057	1042	Q13-1	1-2	430.1	1-2	2.3
	1-0-11	1050	014.0	0	457.1	· 2	lil
	2-1-11	1030	2,55	-7	460;5	-0	1-6
	4-15-1	1050	616-7	1-2	161.5	2.0	and
, Law	4-21-11	1020	690.6	1.7	463.1	1.6	3.5
	9-29-11	0430	100.4	1.0	464,3	1.4	3.2
	10-2-17	1045	701.1	=7	465.3	9-	15
	10-617	1015	702	• 9	4(do. 2	. 9	1.8
	10-13-17	1025	703.7	1.7	467.8	1.6	3.3
	10-2017	1030	705.3	1.6	469.3	1.5	3-1
	10-27-17	1015	7()7	1.7	471	1-7	3.4
	11-3-17	1040	7091	2.1	472.8	1.8	3.9
	10-10-17	1045	711.1	20	474.4	1,6	310
	11-17-17	0945	7131	20	4700	16	3.6
	1-2-1	1025	715.2	21	4777	17	39
	12-1-17	0930	717.2	2.0	1194	1.7	27
	19-8-17	1055	719.7	2.5	481.0	1:6	41
	121517	0930	722.1	2.4	483.0	2	4.4
2000. 2	12-22-17	1025	724	1.9	485-1	2.1	4.0
	10,00 10	(DON	71-0	1 al	10-2		
	2-21-11	1000	125.0	1-0	481.2	2-1	3.9

10:38 Set Gen Run

.

.



2017 JANUARY TOMES PUMP RUN RUN FIME 見 #1 pomp RUNE PUMP DATE: 24 S 61339.2 00109.6 JAN. 1 24 X 51363.2 00109.6 2325 23.8 01387 Ø 00109.6 01411-1 Q4.1 Ø 001.09.6 \$ 000 B 01435 239 60109.6 01459.1 24.1 47 00 109.6 24 01483.1 60109-6 24 89 01508.1 00109.6 A.3 01531,1 D0109.6 24 00109.6 10 01535 1 23.8 01508.9 00/09.6 11 01503.1 24.2 12 00110.7 1.1 61627.2 24.1 DARADO 13 00110.7 01649.9 22.7 00110.7 14 0.1674.7 24.8 00 /10.7 15 24.8 01699.5 16 00 110.7 23.5 66 /10 .7 01723.0 17 23.9 0 17 46.9 DO 112 1.3 18 24 0 1.770,9 .3 Ø 00 19 00112.3 01794.9 24 00112.3 20 23.2 01818.1 00112.3 21 26,6 01844.7 0010.3 22 29.3 51867 23 001123 01891 24 00112.3 04 01915. 24 Q 00112,3 25

		JANU	P24 2	017		
	DAME:	THE POMP	RUN TIME	PUMP !	A.UN TOME	
	JAN. 26 27 28	00112.3 00112.3 00112.3 00112.3	S D D	01939 01963 01987 02011	24 24 24 24	
	- 20 31	00113,4	Ī.L	02035	24	
			RUW	; £J	RUN	
pump Tawn He Down 11 11	0ATE: FEB. 1 2 3 4	PUMP 00115 001213 00122.8 00122.0	J.6 1.6 6.3 1.5 14.2	PUMP 02083 02106.5 02130.4 02140.9	10.5 DME 24 83.5 23.9 10.5	
PANEL Y	MALFUNCTION >	00147,6 00166.2 00175.1	10.6 18.6 8.9	02170.5 03180.2 02204.2	29.6 9.7 2.4	
EST.	> 9 10 11 12 13 14	00204.7 00206.4 00209.3 00211.3 00212.3	14.8	02268.6 02252.5 02276.5 02302,5 02324.5 02348.5	12.2 23.9 24 24 24 24 24	EST, &

			A	Α.		
		FEBR	UALY	2017		
		Pum	PRUN	TIME	>	
	100-0	31	RUN	22	RON	
	TEO IT	POWIP		PUMP		-
	FED. 3	00813.3	20 C	023/2.5	24	
1.5	17	0225	Dela	023905 67425 U	229	
	18	00012,	010	02700,7 02414 4	22	
SWITCH	ROMPS 19	15/0201	18	02468	24	
	20	00256.1	24	02472.7	Q.7	
	a	00278.8	23,7	62470.7	0	
	22	60303.8	24	02472.7	à	
	23	00327.5	23.7	02472.7	B	
	24	00351-4	23.9	02473.1	4	
	. 35	00351.8	.4	02497.1	24	E
	26	003.55.9	4	02.520.7	23.6	
	27	00378.8	23	09530.7	10	
OELANI -		00402.3	23.1	02530.1	8	
5		#1.	DUN	WQ.	(ALL D	
	: Frag	pump	TIME	pomp	Teme	
DECONT	MARCH 1	00426.5	24	025.349	41	
	2	60450.6	04.1	625348	B	
	3	00474.3	23.7	62534.8	0	
	. 4	06448.1	23.8	02534.8	Ø	
	5	005230	24.9	02535.5	*	ler.
	G	00546.5	22.5	08538.2	1.2.7	4
•					A	_

MARCH 2017 YOMES POMP RUN #1 RUN RUN \$ é DATE: pomp TOME pomp TIME S 24 2 7 570.5 DECAN marcu 2538,4 -19.9 DECANT 8 13.6 00590.4 255 R 9 2552 pp pp pp 23.9 6 00614.3 2552 23.9 16 60638.2 A550 11 00661.3 23.1 É 2552 00685 12 23.7 A A A A A A A 2552 13 00709 24 84 2552 00733 14 Ð 00757 24 2552 15 00731.0 2552 Ø ay 16 Ø 24.3 8552 00805.3 17 Ø: 8 02552 23.9 00829.2 18 2 23.9 02560 00853.1 A E 10 24 02570 06877.1 è 06 e 16900 23.9 62572 2 21 E 02577.3 5.3 24 100925 22 E 102579 24 1.7 009 49 DECAN 33 E 24 02581 0973 2 A DECANT E 24 10 J5 02591 00997 6 101 02603 X 01021 · 24 12 E 01045 03604.9 31 24 14 6 02604.4 01069 28 24 Ø -B 02694.4 A 01093 24 -24 BALDAA 36 01127 01141 3 RÅ 02604.4 6

							<u></u>
		AP	REC :	3017	anna an ann an an an an an an an an an a		
	-	PUM	P RUN	TIMES		<u> </u>	-
	nobe-	#1 0.500 0	RUN	1 #2	RUD	U	
	UNIC.	POMP	- 84	POINT	John M		•
1.5	APRIL 1	01165.0	01	02614.5	10.5		-
	Å	01184.0	d4	Valodi. 9	(q, j) 0		-
	3	012130	29	7170 0	3		
	4	12371	ar,	0603, P	4		-
	5	P 1261	00.7	0040001.	1.0		ě
491.055		0166849	23-7 A Å	061630-1	· 1		-
40 Upic	mi 1	01300.1	d4	02091.1	17.6		-
	0	01332.7	24	02010.1	24		¢
	Y In	01306.9	2 T	Dag11-1	X4 OL		-
	10	01500.0	01	002/00.1	8.7		
	11	D1494.0	04	100119.6 60710 (0.0		-
	12	01420.0	AT 10	02/10.0 × 0700/	4		
	15	01400.0	20	100-100.6			-
	计	014/2.0	12	100 100. C	0		-
	J.O.	101496.0	24	Datale. 4	E.		
	16	P1526.8	24	DAISING	20		-
	1/	101549.0 0	24	125.0 manol &	1.05		•
~	13	p360.0	029	10x/30, T	94		Ť
	14	P1542.7		02136.4	2		t
	06	0101011	04	100-150,4			
	Ь. С	101041.0	27.3	027420	10.0 E		-
	22	01/02 0	25.0	02/4/	2		
	33	0.00010	1 d.4	Ud 13 d		٩	
	64	101112.0	24	HL104.0	\$ 3 15		-
	35	01/30-1	2021	UG 100. 2	- 20		
		1				.	

APRIC 2017 POMP RUN TEMES RON RON 也是 Al pomp pump AME : 3740 TITME B 24 017 60.7 02752.3 APPELL 26 Ð 24.1 01789.8 02752.3 27 -0 6 01308.5 28 02752.3 23.7 29 01832.5 02758.3 24 30 01856.5 6 24-02764.3 H #2 RUN RUN DATES PUMP pomp TEME TIME MAY 01880.6 24.1 11 2 02766.3 22 11 CLEAN - CONMICT 23.8 01904.4 02767.4 -23.9 02768.2 .8 01928.3 45 23.4 02768.9 01951.7 . 7 DEGANT 01975.9 24.2 -7 02769.6 01999.9 24 67 02773.6 4 t 02775.7 02023.9 24 2.1 t 8 239 03047.8 02725.7 Ø Ò 24.1 TRANSFERING-9 120719 02775.7 TRANSFERTY 080 95.8 23.9 10 Ì 02775.7 02119.6 23.8 TRANSFERING [] 02776.1 4 24 MORETURAL 12 02143.6 19 ÒX778 23 13 02167.6 24 02781) 02.780.3 14 24 62191.G 15 02780.3 DEEQUIT 24 6 032,15.6 05783.4 31 DERANT 16 24 72239.6

MARY 2017 qmoq F.UN TEMES ł J 北 RUN #2 RUN -POMP DAVE TEME PUMP TIME -2263.5 MAY 17 23.9 02783.4 Ø 18 produce. 28.9 6 2287.4 2783.4 ORATO TANA #2 19 2311, 1 23.7 2784.0 •6 3000000x 20 02334.6 23.5 62784.3 \mathcal{A} 02358 23.4 02784.3 22 02382 24 02784.3 24 23 02406 007843 84 02430 24 027843 25 02453.8 23,8 02784.3 Ø RÇ 2478.1 24.3 2784.3 0 27 2503.3 25.2 27843 0.0 28 2527.4 24.1 2784.3 0.0 2549.3 29 21.9 2784.3 Ô *da*573.8 30 24.5 \$2.784.3 Ø 31 02597.8 24 027843 Ø TUNE 41 RUW #J RUN DATE: pump TIME PUMP PIME CLEAN CL2-TAPN JUNE ! 23.8 2621.6 2785,9 1,6 9 2645.5 23.9 2786.5 . le 3 02669.5 24 027865 Ø 45 02693.4 ,0 ,0 02786.5 23.9 02716.4 23 02786.5 6 02.740.3 23.9 Ø 02786.5 63.5

JUNE 2017 POMP RUN TOMES T T T T T T T T T the HJ RUN RIN pomp DATE: TIME pomp TIME 23.2 JUNE 7 02763.5 02786.5 Ø 8 02787.2 Ì 23.7 00786.5 9 02910.7 23.5 02786.5 2.832.3 21.6 10 000 2786.5 2.859.Le 27.3 27.86.5 11 Ð A A A A A 42881.7 12 221 08786.5 3.1 02905.1 23.4 02789.6 13 Ø 24 02929.1 02789.6 14 29.6 62790-1 15 02952.7 0.5 02976,1 23.4 62790.1 16 Ø 029999.6 23.5 17 02790-1 Ø 03023.2 23.6 18 Ì 02790.1 0 03047.3 25.1 02790.5 19 04 e 03070.4 23.1 1.8 Ē 20 02792.3 03099.4 Ø 24 21 027923 ÌÌ 63118.1 e 02.792.3 22 23.7 C 23 03192-1 NERANT 24 02793.8 1.5 6 24 03166.1 6.5 A\$ 02800.3 e 35 03190.1 31 24 02803.9 ê 26 03214 23.9 02903.5 a / **A**7 24 B 032.38 05803.5 1.0 23.9 28 02805.3 032.61.9 5 PG 032.86 24.1 12805.3 Ê 20 24.1 02806.2 63316.1 Ċ

3019 2017 pomp RUN NEMES RIUN 公世 RUN ttl pomp DAYE: TIME BME PUMP 3064 24.6 3334, 7 2806.2 0 3258.3 2806.2 2345 24.1 Ö 3387.1 22,3 1.0 2807,2 Ö 3406.3 25.2 2867. a *2 2807.4 3429.8 23.5 678 02807.4 \$3453.5 23.7 .D 3.9 2 " Span 02811.3 03477.3 23.8 2.6 03 501.5 02913.9 24.2 9 24 02814.9 1.0 0325.5 10 D D 24 03549.5 02814.9 24 03573.5 09814.9 12 24 03597.5 028/4.9 p3621.5 13 02814.9 K O 24 14 03645.5 02814.9 23.6 15 03669.1 62814.9 03697.6 02814.9 28.5 16 02814,9 19.9 11 03717.5 02816.3 1.4 24 18 137415 1 24 02817.3 19 03765.5 ðb Ø 24 63789.5 02817. 3 21 24 Q.103813.5 02819.4 DECANT 22 02820 23.8 03837.3 .6 02822.5 B 03861.3 24 2.5 24 24 03885.3+ 02824,7 2.2 H 03909.3 028353 24 10.6

	<u>.</u>	JULY PUMP RUN	2017 3 Yomes			
	DATE:	#1 POMP	RON TOMES	#a Pomp	ROD	
	50426	02933.3	24	02836.3	L	
	28	03981.3	23.9	02838.3	1.5	
	30	04029.3	24	02852.9	10-6 4	
	31_	04053.4	24.1	03855.9	3	
	8		9 (1.)			
1	DATE:	Pomp	TIME	PUMP	TIME	
	A06. 1 2	04077.4	24 239	02856.6	.8	
	3	04125.4	24.1	02857.8 02862.9	.4	
	56	04173.5	24.0	02864.0	1.1	
	2	09221.2	21.1	02870.8	4.6	
	9	04245.2	24	02881.9	3.7	
	10	04243.2	24,3	() 2882.5 02883.8	.6 1:3	
	12	64341.1 04366.4	23.6 25.3	02894.0	10.2 3.0	
	14	04389.2	22.8	02908.6	11.6	
	10	104412.0	-	0.00	₿ ₽ s	04.0

AUGUST 2017

POMP RUN TEIMES

1		1.1	Run	1 42.5	Drew	70
	DATE:	Pomp	TELMES	Pump	TIMES	
	AUG. 16	104437.2	24	102923	4.7	1.
	17	04461.2	24	02924.9	1.9	
	18	644 251 2	24.	0290513	014	
	19	0458.7	23.5	02926,1	0.8	
	20	04532.7	24	02928.5	2.4	
	2.1	04557-1	24-4	02929-5	1.0	
line and the second sec	22	04581-1	24	0 29 30 6	1.2	
in the second se	83	04605.2	29.1	02939.6	4	
-	24	04629-2	24	08936.1	1.5	
	25	04653.2	24	02936.5	· 4	
	H	04677.3	24.1	02937.2	. 7	
	9.7	04701.3	24	02940.5	3.3	
	28	04725.2	23.9	02944.2	3.7	
	34	04749.2	24	02945	8	
	30	04773	23.8	02945.6	.6	
-	36	04797.2	24.9	62948.1	2.5	
						Ī
					~ ~	
	Dass.	出1	RUN	#Q	RON	
	UAIES	1 yomp	TUMES	pomp	YEARS	
	SPACI	04821.1	23.9	02948.1	0	
	0	104045. 1 104045.	24	02950.1	2	
	$\frac{2}{3}$	O POPL	24 10	02759.2	4.1	4
10.00	-M14 2	07.004.5	30,4	00/00	1.2	
6		0411/	d1.2 10	Ja150.4	3.5	
	1		3 3		1	

	SEPTEM!	BER S	1017			3
O AVE:	HE ROLD	AUN	- #2	RUN		3
SEPT. G	104940,9 104940,9 104964.8	23.9 23.9	02967.8	3.8 5.1	•	2
8	()-1988,9 . 0 5012.7	24	02967.8	0.5		2
10	0.5036.8 0.5060.9 05084.9	24.1 24	02971.9	1.0		
13	05/08.9	24	02973.6	2.0		
15 16 17	05180.8	24 23.8	02974.7 02975.2	.5	V	E E
18 19	05288.5 05252.5	23.9	00975.3	10		
20	05300.5	24	02778.3	,8		
23	05348.6	23.9	62980.9	1.1		
25	05346.9 05420.5 05444.5	23.0 24.1 24	02983.2 02983.7 02984.3	2.3		
28 29	05468.4	23.9	02984.3	B S	×.	3
30	622102	29.1	0 - 7 8 4.5	de la		7

-

	CTOBER	201 N TOME	7	ner in an	
DATE:	Pomp	RUN	#2 PUMP	RUN	
0007. 1	05540.5	29	029843	Ð	
31	D55 98 L	24	02986	17	
5	05635.8	23.8	62.987.2	Ø	
7	5683.9	23.4	02987.4	0	
9	05731.1	22.6	62988.5	1.0	
11	05779.1	84	02999.5	3	È
13	05826.6	23.9	02996.9	10	
15 15 1	05874.2	23.8	02997.1	8 V	
16 17 19	05921.5	23,7	62997-1	15 15	
19	05969.2	23.6	02997.1	Ø.	
2.	06017-1	83.7	02997.1	Ø	
2	3 06064. 1 NORE	28.5	02997.1	8	Ł
\$ 6	5 06111.	9 23.8	62999.7	6	

		DOMP KI	201- M TEM) NES			IN AD AD
	DATE:	#1 pomp	RUN TEME	#2 Pump	RUN	i,	
CLEAN-OUT DEEP WELL	DCT. 26	06135.6	23.7	03001.2	1.5		0
- 5	27	06150.7	23.9	03001.9	• Q. Y	• 2	
	29	66206.7	24.1	030023	.5		
	30	06230.5	24.0	03017	3.7		e e e e e e e e e e e e e e e e e e e
1		NOVE	MBER				
	0.576*	t! Pump	RUN	equip 1	RIM		e
	NOV. 1	06279.5	2.4	03026.1	1.4		
	22	06302.9	24.4	03036.9	4.8		
) V	06350.6	, 24	036.3	2.9		¢
	5	06374.6	89	03038.3	2		e
~	2	06423.4	23.8	030466	. 3		
	So G	06491.7	124.3	03042.9	2.3		
	10	06495.4	23.9	03043.4	.5		2 A 1
	10	06543.1	24.2	03046.7	5.3		
		06567.3	5 .83.9	03047.2	-5		N. C.
	12	t 106591.	4 23,1	103041.	C.		ł

NOVEMBER 2017 RUMP RUN TEMES Pomp Prov RUN #1 DATES pump TIME 23.9 13 06615.3 03048 NOV. 15 24.1 .2 04639.4 16 63048.2 4.20 03048.7 24 06663.4 17 23,9 1×1736,3 03052.9 18 03052.9 06760.3 24 Ø 19 03052.9 Ø 3333 90 06736.3 0252.9 R 200 7 23.1 0675.9.14 02052.9 22 24.0 06783.4 0 3052.9 J9 03053.6 56807.4 24 2.7 03056.3 24 06831 23.6 25 06855 03056.4 24 G. | T Ø 03056.4 H 06879.2 24.2 T Ø 23.3 03056.4 27 04900.5 0 Jas6. 4 06926,2 23.7 29 Ø 23.3 03056.4 29 66949.5 24:2 R 120973.7 03056.4 20 DECEMBER RUN #2 RUN 112 pump TIME PUMP TIME DATE: Ď DEC. 1 24.0 03056.4 04997.7 .G 23.8 03057 070215 200 83.7 03057.4 07045,2 . 5 03057.9 070689 25.1

DECEMBER 2017 PUMP TIMES RUN RWP \$ \$ RUN A JOME DUMP ORTE: TIME pomp Ì 23.8-03057.9 DEC.5 07092.7 03061-2 3.3 29.9 6 07/16.6 23.4 03061.2 7 Ø 67/40 030612 24.9 Ø 57164.9 9 03061.a Ø 4.1 23.1 9 07188:0 03065.3 07212.3 29.3 16 Э, 24 03067.3 07236.3 11 23,8 5.5 03072.8 07260.1 19 03078.8 D D D D 24 07284.1 13 03072.8 23.9 07308 14 630 22.8 24.1 07332.1 15 63072.8 07355,9 23.8 Kp Ì 03072.8 07379.7 23.8 $\widehat{}$ Ø [.7 03072.8 24 18 07403.7 03074-5 23.8 07427.5 İ٩ 03074.5 23.8 Ŋ Ŋ 90 07451.3 03074.5 23.7 07475 21 23.9 -0 03074.5 02498.9 II. 24.1 03078.2 3.7 07523.0 B 27.0 03085.4 7.2 07556.0 24 30.3 03085.9 -5 07550,3 25 24.3 03085.9 07594.6 26 B 03085.9 24 07618,6 27 03089.5 3.6 23.7 28 07623 03089.5 23.8 07666.1 R

DECEMBER 2017 PUMP RUN TEMES RUN RUN #2 北 pomp PILME POMP TIME DATE .0 23.9. 03089,5 DEC. 30 07690 63091.7 2.2 29.1 31 07714.1 F F F 3







*** SERVICE REPORT ***

HALIFAX MUNICIPAL AUTHORITY P.O. BOX 443 HALIFAX, PA 17032

SERVICE DATE: DECEMBER 20, 2017 METER#: C8201 AA LOCATION: WASTEWATER - EFFLUENT SERIAL #: 12286/9404-31238-B02 MANUFACTURER: BADGER/CHESSELL RECORDER: 392 TRANSMITTER: 2210 PRIMARY: WEIR V-NOTCH 90° MAXIMUM CAPACITY: 347.2 GPM SERVICE CONTRACT: ANNUAL

*** WORK PERFORMED ***

TRANSMITTER CALIBRATION LEVEL MEASUREMENTS AND FLOW CHECKS ERROR: 0.29% TOLERANCE: ±1%

RECORDER CALIBRATION CHECKED AT: 0, 50, 100% ERROR: 0,0,0% TOLERANCE: ±1%

TOTALIZER CALIBRATION CHECKED AT: 0, 50, 100% ERROR: 0,0,0% TOLERANCE: ±1%

*** TECHNICIAN COMMENTS ***

PERFORMED ANNUAL CALIBRATION CLEANED PRIMARY ADJUSTED METER LEFT EQUIPMENT OPERATING PROPERLY

SERVICE REPRESENTATIVE(S): JOE LATRELL





369 East Park Drive Harrisburg, PA 17111 717.564.1121 (FAX) 717.564.1158 www.hrg-inc.com

March 27, 2018

Clean Water Program PA Department of Environmental Protection Southcentral Regional Office 909 Elmerton Avenue Harrisburg, Pennsylvania 17110-8200

Re:

NPDES Permit No. PA0024457 Corrective Action Plan Update: Semi-Annual Report Main Pumping Station and Wastewater Treatment Plant Halifax Area Water and Sewer Authority

Dear Clean Water Program:

On behalf of the Halifax Area Water and Sewer Authority (HAWASA), Herbert, Rowland & Grubic, Inc. (HRG) hereby submits this Corrective Action Plan (CAP) Update Report in accordance with the Semi-Annual Reporting requirements outlined in the June 20, 2017 CAP submitted by HAWASA and approved by the Department via letter dated August 8, 2017. This CAP Update Report will be included as Attachment F to the HAWASA Chapter 94 Wasteload Management Report for Calendar Year 2017.

The Main Pumping Station located at the HAWASA Wastewater Treatment Plant (WWTP) is considered to be hydraulically overloaded in accordance with 25 Pa. Code § 94.12. As required by 25 Pa. Code § 94.21, HAWASA submitted the approved CAP to reduce the overload condition at the Main Pumping Station. The approved CAP includes the modification to the Main Pumping Station as part of a WWTP upgrade project to be completed by HAWASA.

This CAP Update Report provides the status of the Tasks identified in the Implementation Schedule contained in the HAWASA CAP. This Report also summarizes any new connections to the portion of the HAWASA system which is tributary to the overloaded sewerage facilities.

Consent Order and Agreement

On January 10, 2018, a draft Consent Order and Agreement (COA) was issued to HAWASA by the Pennsylvania Department of Environmental Protection (PA DEP). The COA contains a schedule for Corrective Action (Section 3), a proposed Civil Penalty Settlement (Section 4) and Stipulated Civil Penalties (Section 5) in the event that HAWASA fails to comply in a timely manner with any term or provisions of the COA.

In response to the draft COA, HAWASA issued formal written comments to PA DEP via letter dated January 31, 2018. The January 31, 2018 HAWASA letter requested a time extension for the Completion/Submission Date contained in the CAP for the WWTP Alternatives Review, Design Engineer's Report and Uniform Environmental Report until December 31, 2018. The requested time extension will allow for the completion of an Act 537 Sewage Facilities Plan by Halifax Township which will be used by HAWASA to complete its evaluation of WWTP upgrade alternatives. The January 31, 2018 HAWASA response also clarified the current Implementation Schedule contained in the approved CAP and requested a reduction in the Civil Penalty Settlement and Stipulated Civil Penalties.

Clean Water Program PA Department of Environmental Protection March 27, 2018 Page 2

A copy of the draft COA and the HAWASA response dated January 31, 2018 are attached hereto.

On March 19, 2018, representatives of HAWASA, PA DEP and HRG met to discuss the HAWASA response to the COA. The March 19, 2018 meeting was also attended by a representative of the Halifax Township Board of Supervisors who provided additional information regarding the anticipated schedule for completion of the Township's Act 537 Sewage Facilities Plan. As a result of the March 19, 2018 meeting, a revised COA is anticipated to be prepared by PA DEP which will then be considered for execution by HAWASA at a regular monthly meeting.

Implementation Schedule - Update

The Implementation Schedule below is included in the HAWASA CAP. For the purpose of this Report, a new "Status/Update" column has been inserted to demonstrate HAWASA's compliance with the Implementation Schedule.

IMPLEMENTATION SCHEDULE FO	IMPLEMENTATION SCHEDULE FOR HAWASA WWTP UPGRADE							
TASK DESCRIPTION	COMPLETION / SUBMISSION DATE	STATUS/ UPDATE						
Revised CAP Submission to PA DEP	By June 23, 2017	 Submitted by HAWASA on June 22, 2017 Approved by PA DEP on August 8, 2017 [Task Completed] 						
 Complete WWTP Upgrade alternatives review and Design Engineer's Report with the following key components: Review previous HAWASA evaluation of WWTP improvement alternatives Prepare existing and future flow and loading projections including flow metering study as required Request and receive preliminary effluent discharge limits for WWTP Upgrade from PA DEP WWTP Improvements alternatives review Identification and selection of recommended improvements Preparation of Design Engineer's Report Preparation of Preliminary Engineering & Uniform Environmental Reports 	April 17, 2018	 HRG has reviewed the previous HAWASA evaluation of WWTP improvement alternatives The HAWASA WWTP operator installed three portable (3) flow meters in the HAWASA collection system to monitor the flow from each main portion of the system to the WWTP The HAWASA WWTP operator is continuously collecting water quality data to assist in the basis of design for WWTP improvements; Additional influent sample analysis was performed from September to December 2017 to supplement current monitoring HRG requested preliminary effluent discharge limits for an increased WWTP discharge on January 17, 2018; Preliminary effluent 						

Clean Water Program PA Department of Environmental Protection March 27, 2018 Page 3

IMPLEMENTATION SCHEDULE F	OR HAWASA WWTP UP	GRADE
TASK DESCRIPTION	COMPLETION / SUBMISSION DATE	STATUS/ UPDATE
		 limits were provided by PA DEP on March 8, 2018 HRG has prepared a draft Design Engineer's for the WWTP upgrade project which evaluated alternatives for an increased WWTP discharge; Halifax Township flow contributions to be confirmed during the Township's Act 537 Plan preparation HRG has begun preparing the Uniform Environmental Report; PNDI & PHMC notifications were completed in January 2018
Submit administratively and technically complete Uniform Environmental Report for WWTP Upgrade to PA DEP	April 20, 2018 [January 31, 2018 COA response letter requested extension until December 31, 2018]	m sundary 2010
Begin Design Phase	Within 45 Days of PA DEP approval of Uniform Environmental Report	
Submission of administratively and technically complete Water Quality Management Part II Permit Application to PA DEP	Within 180 Days of PA DEP approval of Uniform Environmental Report	
Advertise for Construction Bids	Within 90 Days of PA DEP issuance of Water Quality Management Permit	
Construction Contract Award	Within 60 Days of Receipt of Bids [January 31, 2018 COA response letter indicated PENNVEST funding will be pursued; additional time for this item may be required for PENNVEST award	
Complete Construction	Within 450 Days from Construction Contract Award	

Clean Water Program PA Department of Environmental Protection March 27, 2018 Page 4

	COMPLETION /	STATUS/
TASK DESCRIPTION	SUBMISSION DATE	UPDATE
12-Month Compliance Monitoring Period	12-Month Period from	
	Construction	
	Completion	

Restriction on Connections Tributary to Overloaded Sewerage Facilities

Per the terms of the approved CAP, HAWASA will limit new connections within the area tributary to the Main Pump Station to a total of twenty-five (25) new EDUs (not otherwise meeting the definitions of 25 Pa Code §§ 94.55, 94.56 and 94.57) during the term of the CAP until the hydraulic overload condition is eliminated. There have not been any new connections within the CAP area as of the date of this Update Report.

There is no restriction on connections in the southern portion of the HAWASA collection system located in Halifax Township as this area is not tributary to the Main Pumping Station. New connections made to this portion of the system are further detailed in the HAWASA Chapter 94 Report for Calendar Year 2017.

Semi-Annual Reporting

HAWASA will continue to submit semi-annual CAP Update Reports to PA DEP. Unless otherwise modified by the COA, Update Reports will be submitted to PA DEP prior to March 31st of each year, concurrent with the HAWASA submission of its Annual Chapter 94 Report, and again prior to September 30th of each year.

If you have any questions or comments regarding the CAP Update Report, please do not hesitate to contact me at 717-564-1121. Thank you.

Very truly yours,

Herbert, Rowland and Grubic, Inc.

led

Fustin J. Mehdinsky, P.E. Water & Wastewater Project Manager

JJM/rb 01650.0426 P:\0016\001650_0426\Admin\Corres\CAP Correspondence\2018.03.27 CAP Update.docx

cc: HAWASA Board Jeffrey Grosser, Operator Christian S. Daghir, Esq., Etzweiler and Associates, Solicitor

HRG File

HALIFAX AREA WATER AND SEWER AUTHORITY

PO Box 443, Halifax, PA 17032

Phone: 717-896-3886 F

Fax: 717-896-3780

January 31, 2018

Mr. Andrew Hall Clean Water Program PA Department of Environmental Protection Southcentral Regional Office 909 Elmerton Avenue Harrisburg, Pennsylvania 17110-8200

Re: Halifax Sewage Treatment Plant NPDES Permit No. PA0024457 Consent Order and Agreement Halifax Area Water and Sewer Authority

Dear Mr. Hall:

The Halifax Area Water and Sewer Authority (HAWASA) is in receipt of the above referenced draft Consent Order and Agreement (COA) issued to HAWASA on January 10, 2018. Your January 10, 2018 email to our Engineering Consultant, Justin Mendinsky, P.E. of Herbert, Rowland & Grubic, Inc. (HRG), requests that comments and requested revisions to the COA be provided by HAWASA within thirty (30) days of its issuance by the Department of Environmental Protection (PA DEP).

Please consider this letter as formal correspondence from HAWASA requesting revision to the draft COA as originally prepared by PA DEP. HAWASA requests to meet with PA DEP at your earliest convenience in order to further discuss the comments and requested revisions contained within this response and in order to reach a mutual COA which HAWASA would consider executing following formal action by its Board members at a regularly scheduled HAWASA Board meeting.

HAWASA Comments and Requested Revisions:

1. HAWASA is aware that PA DEP has issued correspondence to Halifax Township seeking an update on the Township's preparation and submission of an Act 537 Sewage Facilities Plan and recently met with representatives of the Township and its engineering consultant regarding the Act 537 Plan. It is our understanding that as part of the Township's Act 537 Plan, PA DEP has requested that an evaluation of sewage needs within the Township be completed, including a review of on-lot disposal system (OLDS) malfunctions, potential rerouting of sewage flows from the existing Lenker Estates WWTP to HAWASA and a review of sewage disposal needs for the Sterman Masser, Inc. facility.

As you are aware, as part of its Corrective Action Plan (CAP) approved by PA DEP on August 8, 2017 (attached hereto for reference), HAWASA is currently investigating WWTP upgrade alternatives to accommodate the future sewage needs of its service area and to eliminate NPDES Permit effluent discharge violations. The identification of future sewage needs within Halifax Township which would be served by HAWASA is critical to the completion of the WWTP upgrade alternatives review. It is desired by HAWASA that any future upgrade to its WWTP be able to accommodate the future sewage needs of Halifax Township.

Mr. Andrew Hall PA Department of Environmental Protection January 31, 2018 Page 2

In consideration of PA DEP's request for Halifax Township to complete and submit an Act 537 Plan, HAWASA requests a time extension for the completion of the Corrective Action identified in Article 3 of the COA. Based solely on an estimate of time which we believe will be required for Halifax Township to identify its future sewage needs at the HAWASA WWTP, we request that the Completion/Submission Date for the WWTP Alternatives Review, Design Engineer's Report and Uniform Environmental Report be extended until December 31, 2018. This request for time extension assumes that Halifax Township will provide HAWASA with its future sewage needs at the HAWASA WWTP by October 1, 2018. Please note that this date has not been confirmed by the Township at this time.

The Corrective Action schedule provided in Article 3 of the COA is not consistent with the "Implementation Schedule for HAWASA WWTP Upgrade" included in the approved CAP. The COA requires that construction of the WWTP upgrade must begin within 150 days of PA DEP's issuance of the Water Quality Management Part II Permit (Part II Permit). Further, the COA requires that construction be completed within 600 days of PA DEP's issuance of the Part II Permit. However, this schedule is not consistent with the CAP and does not properly account for the required time associated with the Bid and Contract Award Phases of the project as outlined in the CAP.

The following partial schedule associated with bidding and construction of the WWTP Upgrade is included in the CAP:

TASK DESCRIPTION	
	COMPLETION / SUBMISSION DATE
Advortise for Complexity Dil	Within 90 Days of PA DEP issuance of Water
Advertise for Construction Bids	Quality Management Permit
Construction Contract Award	Within 60 Days of Receipt of Bids
Complete Constanti	Within 450 Days from Construction Contract
Complete Construction	Award

As shown in the partial schedule above taken from the CAP, the award of the Construction Contract for the WWTP Upgrade is to be within 60 days of the receipt of bids, not within 150 days of the Part II Permit issuance. It is anticipated that a minimum bidding period of 45 days will be required which would extend the time between Part II issuance and Construction Contract Award. Further, because HAWASA anticipates applying for PENNVEST funds for the WWTP Upgrade, the Construction Contract Award may be delayed beyond 60 days from the receipt of bids as identified in the CAP. Similarly, the construction completion date in the CAP is identified as within 450 days from the Construction Contract Award, not within 600 days of the Part II Permit issuance.

3. Article 4 of the COA stipulates that "upon signing this COA, HAWASA shall pay a civil penalty of \$5000.00." While HAWASA is aware that the basis for the civil penalty is associated with NPDES Permit violations at the HAWASA WWTP and penalties for which are prescribed by PA DEP, we request that the civil penalty be further reduced to avoid increases in user rates for HAWASA customers. It is anticipated that significant user rate increases may be required for construction of the WWTP Upgrade if grant funds are not

2.

Mr. Andrew Hall PA Department of Environmental Protection January 31, 2018 Page 3

received. Additionally, we request that the COA identify an exact time from signing when this penalty would become due.

4. Article 5 and associated Exhibit 2 of the COA prescribe stipulated penalties for future violations of the HAWASA NPDES Permit effluent limits. HAWASA requests that penalties for future NPDES violations be waived during the period from current time until the new WWTP Upgrade is placed in service. This is again to eliminate any hardship on HAWASA customers and because the WWTP Upgrade is anticipated to result in significant user rate increases if grant funds are not received. If PA DEP cannot waive penalties for future effluent violations prior to the completion of the WWTP Upgrade, HAWASA requests that a reduction in the stipulated penalties be granted by PA DEP.

HAWASA appreciates the opportunity to provide PA DEP with the above comments on the draft COA and we look forward to meeting with you to further review the requested revisions.

If you have any questions or comments regarding this letter, please do not hesitate to contact me or our Engineering Consultant, Herbert, Rowland & Grubic, Inc. (ATTN: Justin Mendinsky, P.E.) at (717) 564-1121.

Sincerely,

HALIFAX AREA WATER AND SEWER AUTHORITY

3 map Fred L. Ford, Jr.

Chairman

- Attachment: HAWASA CAP August 8, 2017 PA DEP CAP Approval Letter
- Cc: Halifax Borough Halifax Township Supervisors Christian S. Daghir, Esq., Etzweiler and Associates, Solicitor Justin J. Mendinsky, P.E., Herbert, Rowland & Grubic, Inc., Engineer File

COMMONWEALTH OF PENNSYLVANIA DEPARTMENT OF ENVIRONMENTAL PROTECTION

In the matter of:

Halifax Area Water and Sewer Authority	:	The Clean Streams Law
PO Box 443	:	Halifax Sewage Treatment Plant
Halifax, PA 17032-0443	:	NPDES Permit No. PA0024457
	:	Halifax Borough, Dauphin County

CONSENT ORDER AND AGREEMENT

This Consent Order and Agreement ("COA") is entered into this day of , 2018, by and between the Commonwealth of Pennsylvania, Department of Environmental Protection ("Department"), and Halifax Area Water and Sewer Authority ("HAWASA").

The Department has found and determined the following:

- A. The Department is the agency with the duty and authority to administer and enforce the Pennsylvania Clean Streams Law, the Act of June 22, 1937, P.L. 1987, <u>as amended</u>, 35 P.S. § 691.1 <u>et seq</u>. ("The Clean Streams Law"); Section 1917-A of the Administrative Code, the Act of April 9, 1929, P.L. 177, <u>as amended</u>, 71 P.S. § 510-17 ("Administrative Code") and the rules and regulations promulgated thereunder, and which has been delegated authority to administer the National Pollutant Discharge Elimination System ("NPDES") permit program under the Federal Clean Water Act, 33 U.S.C § 1342.
- B. HAWASA is a municipal authority formed under the laws of the Commonwealth of Pennsylvania, with a mailing address of P.O. Box 443, Halifax, Pennsylvania 17032.
- C. HAWASA owns and operates a municipal wastewater treatment plant ("Plant") and an associated collection system that are located in Halifax Borough, Dauphin County, Pennsylvania.
- D. The Plant discharges treated effluent into the Susquehanna River, a water of the Commonwealth, under NPDES Permit No. PA0024457 ("NPDES Permit"). The discharge of treated effluent constitutes sewage pursuant to Sections 201 and 202 of The Clean Streams Law, 35 P.S. §§ 691.201 and 691.202.
- E. All dischargers are required by their NPDES permits and Sections 201 and 202 of the Clean Streams Law, 35 P.S. §§ 691.201 and 691.202, to comply fully with the effluent limits set forth in their NPDES permit.

- F. At various times, between March 2013 and September 2017, HAWASA discharged wastewater contrary to the terms and conditions set forth in its NPDES Permit. The violations are fully listed in Exhibit No. 1, which is attached hereto and incorporated herein by reference.
- G. On October 5, 2016, the Department conducted an administrative file review of HAWASA's Discharge Monitoring Reports ("DMRs") and documented violations of its NPDES effluent limits for Fecal Coliform and Total Suspended Solids.
- H. On October 5, 2016, the Department issued a Notice of Violation ("NOV") to HAWASA for its failure to comply with its NPDES effluent limits.
- I. On, October 21, 2016, HAWASA responded to the Department's NOV described in Paragraph H, above. HAWASA attributed the effluent violations to treatment plant conditions, low pH, which caused poor settleability conditions resulting in Total Suspended Solids violations.
- J. On June 20, 2017, HAWASA submitted a Corrective Action Plan ('CAP") to the Department in order to eliminate the hydraulic overload condition outlined in its Chapter 94 Report and upgrade its Plant.
- K. On August 8, 2017, the Department issued a CAP approval letter to HAWASA.
- L. The violations of the permitted effluent limit described in Paragraph F, and G, above, and Exhibit No. 1, attached, constitute violations of Sections 201 and 202 of the Clean Streams Law, 35 P.S. §§691.201 and 691.202.
- M. The violations described in Paragraph L, above, constitute unlawful conduct under Section 611 of The Clean Streams Law, 35 P.S. § 691.611; and subject HAWASA to a claim for civil penalties under Section 605 of The Clean Streams Law, 35 P.S. § 691.605.

<u>ORDER</u>

After full and complete negotiation of all matters set forth in this COA and upon mutual exchange of covenants contained herein, the parties desiring to avoid litigation and intending to be legally bound, it is hereby ORDERED by the Department and AGREED to by HAWASA as follows:

1. Authority. This COA is an Order of the Department authorized and issued pursuant to Sections 5 and 610 of the Clean Streams Law, 35 P.S. § 691.5 and 691.610; and Section 1917-A of the Administrative Code, 71 P.S. § 510.17.

2. Findings.

- a. HAWASA agrees that the findings in paragraphs A through M are true and correct and, in any matter or proceeding involving HAWASA and the Department, HAWASA shall not challenge the accuracy or validity of these findings.
- b. The parties do not authorize any other persons to use the findings in the COA in any matter or proceeding.

3. Corrective Action.

- a. On or before April 20, 2018, HAWASA shall submit to the Department a Wastewater Treatment Plant Alternatives Review, Design Engineer's Report, and an administratively and technically complete Uniform Environmental Report for the upgrade of the Plant and main pumping station.
- b. Within 180 days of the Department's approval of the Uniform Environmental Report, HAWASA shall submit to the Department, an administratively and technically complete Water Quality Management Part II Permit ("Part II Permit") application for the for the upgrade of the Plant and main pumping station.
- c. Within 150 days of the Department's issuance of the Part II Permit, HAWASA shall begin construction of the Plant upgrade in accordance with the Part II Permit.
- d. Within 600 days of the Department's issuance of the Part II Permit, HAWASA shall complete construction in accordance with the Part II Permit. HAWASA shall verify completion of construction by submission of the Sewage and Industrial Wastewater Facilities Construction Certification ("Construction Certification") within 30 days of completed construction operations. The construction completion date shall be established by the Construction Certification.
- e. If the Department requires additional information to review or approve any submittal necessary to comply with this COA, HAWASA shall submit the requested information within ten (10) calendar days of the date of the Department's notice that such information is required; however, upon written request, including a justification from HAWASA, the Department may allow an extension for such a submittal.
- 4. **Civil Penalty Settlement**. Upon signing this COA, HAWASA shall pay a civil penalty of \$5,000.00. This payment is in settlement of the Department's claim for civil penalties for the violations set forth in Paragraph L, above, covering the period set forth in Paragraph F, above. The payment shall be by corporate check or the like, made payable to "Commonwealth of Pennsylvania," with the memo line specifying the "Clean Water

Fund," and sent c/o Andrew Hall, DEP Clean Water Program, 909 Elmerton Avenue, Harrisburg, PA 17110-8200.

5. Stipulated Civil Penalties.

- a. In the event HAWASA fails to comply in a timely manner with any term or provision of this COA, HAWASA shall be in violation of this COA and, in addition to other applicable remedies, shall pay a civil penalty in the amount determined under the following schedule:
 - (1) For any violation of paragraphs 3.a. through 3.e, \$100 per day for the first 30 days of each violation, and \$200 per day for each violation extending beyond the first 30 days.
 - (2) For any violation of the HAWASA's NPDES effluent limits, HAWASA shall pay a stipulated penalty as outlined in Exhibit 2, which is incorporated by reference into this COA.
 - (3) Quantity and Concentration shall be considered separate violations.
- b. Stipulated civil penalty payments for any violation of paragraph 3 herein shall be payable monthly on or before the fifteenth day of each succeeding month, and shall be forwarded as described in paragraph 4 above. Stipulated civil penalties for violation of HAWASA's NPDES effluent limits shall be payable within thirty (30) calendar days of submission of a monthly monitoring report for any such violation. The penalties shall be due automatically and without notice.
- c. Any payment under this paragraph shall neither waive HAWASA's duty to meet its obligations under this COA, nor preclude the Department from commencing an action to compel HAWASA's compliance with the terms and conditions of this COA. The payment resolves HAWASA's liability only for civil penalties arising from the violation of this COA for which the payment is made.

6. Additional Remedies.

a. In the event HAWASA fails to comply with any provision of this COA, the Department may, in addition to the remedies prescribed herein, pursue any remedy available for a violation of an order of the Department, including any action to enforce this COA.

- b. The remedies provided by this paragraph and paragraph 4 are cumulative and the exercise of one does not preclude the exercise of any other. The failure of the Department to pursue any remedy shall not be deemed to be a waiver of that remedy. The payment of a stipulated civil penalty, however, shall preclude any further assessment of civil penalties for the violation for which the stipulated civil penalty is paid.
- c. No provision of this COA shall preclude the Department from pursuing civil penalties for past violations, or any future reported or documented violations, except those violations covered by Paragraph 4 of this COA.
- 7. **Reservation of Rights.** The Department reserves the right to require additional measures to achieve compliance with applicable laws. HAWASA reserves the right to challenge any action which the Department may take to require those measures.
- 8. Liability of Operator. HAWASA shall be liable for any violations of the COA, including those caused by, contributed to, or allowed by its officers, agents, employees or contractors. HAWASA also shall be liable for any violation of this COA caused by, contributed to, or allowed by its successors and assigns.

9. Transfer of Site.

- a. The duties and obligations under this COA shall not be modified, diminished, terminated, or otherwise altered by the transfer of any legal or equitable interest in the Plant or any part thereof.
- b. If HAWASA intends to transfer any legal or equitable interest in the Plant which is affected by this COA, HAWASA shall serve a copy of this COA upon the prospective transferee of the legal and equitable interest at least 30 days prior to contemplated transfer and shall simultaneously inform the Department's Southcentral Regional Office of such intent.
- c. The Department in its sole discretion may agree to modify or terminate HAWASA's duties and obligations under this COA upon transfer of the Plant. HAWASA waives any right that it may have to challenge the Department's decision in this regard.

10 **Correspondence with Department.** All correspondence with the Department concerning this COA shall be addressed to:

Andrew Hall DEP Clean Water Program Southcentral Regional Office 909 Elmerton Avenue Harrisburg, PA 17110-8200 Phone: (717) 705-4789 Fax: (717) 705-4760

11. Correspondence with HAWASA. All correspondence with HAWASA concerning this COA shall be addressed to:

Fred Ford Authority Chairman Halifax Area Water and Sewer Authority PO Box 443 Halifax, PA 17032 Phone: (717) 896-8149

HAWASA shall notify the Department whenever there is a change in the contact person's name, title, or address. Service of any notice or any legal process for any purpose under this COA, including its enforcement, may be made by mailing a copy by first class mail to the above address.

12. Severability. The paragraphs of this COA shall be severable and should any part hereof be declared invalid or unenforceable, the remainder shall continue in full force and effect between the parties.

13. Force Majeure.

a. In the event that HAWASA is prevented from complying in a timely manner with any time limit imposed on this COA solely because of a strike, fire, flood, act of God, or other circumstances entirely beyond HAWASA's control and which HAWASA, by the exercise of all reasonable diligence, is unable to prevent, then HAWASA may petition the Department for an extension of time. An increase in the cost of performing the obligations set forth in this COA shall not constitute circumstances beyond HAWASA's control. HAWASA's economic inability to comply with any of the obligations of this COA shall not be grounds for any extension of time.

- b. HAWASA shall only be entitled to the benefits of this paragraph if it notifies the Department within five working days by telephone and within ten working days in writing of the date it becomes aware or reasonably should have become aware of the event impeding performance. The written submission shall include all necessary documentation, as well as a notarized affidavit from an authorized individual specifying the reasons for the delay, the expected duration of the delay, and the efforts which have been made and are being made by HAWASA to mitigate the effects of the event and to minimize the length of the delay. The initial written submission may be supplemented within ten working days of its submission. HAWASA's failure to comply with the requirements of this paragraph specifically and in a timely fashion shall render this paragraph null and of no effect as to the particular incident involved.
- c. The Department will decide whether to grant all or part of the extension requested on the basis of all documentation submitted by HAWASA and other information available to the Department. In any subsequent litigation, the operator shall have the burden of proving that the Department's refusal to grant the requested extension was an abuse of discretion based upon the information then available to it.
- 14. Entire Agreement. This COA shall constitute the entire integrated agreement of the parties. No prior or contemporaneous communications or prior drafts shall be relevant or admissible for purposes of determining the meaning or extent of any provisions herein in any litigation or any other proceeding.
- 15. Attorney Fees. The parties shall bear their respective attorney fees, expenses, and other costs in the prosecution or defense of this matter or any related matters, arising prior to execution of this COA.
- 16. **Modifications.** No changes, additions, modifications, or amendments of this COA shall be effective unless they are set out in writing and signed by the parties hereto.
- 17. **Titles.** A title used at the beginning of any paragraph of this COA is provided solely for the purpose of identification and shall not be used to interpret that paragraph.
- 18. Decisions Under Consent Order. Any decision which the Department makes under the provisions of this Consent Order and Agreement, including a notice that stipulated civil penalties are due, is intended to be neither a final action under 25 Pa. Code § 1021.2, nor an adjudication under 2 Pa. C.S. § 101. Any objection which HAWASA may have to the

decision will be preserved until the Department enforces this Consent Order and Agreement.

19. Termination. The obligations of this COA shall terminate when HAWASA has completed, to the Department's satisfaction, the actions required in Paragraphs 3 and 4, paid any stipulated penalties due under Paragraph 5, and demonstrated six consecutive months of compliance with its NPDES effluent limits after the completion of the approved diagnostic evaluation and implementation schedule.

IN WITNESS WHEREOF, the parties hereto have caused this COA to be executed by their duly authorized representatives. The undersigned representatives of HAWASA certify under penalty of law, as provided by 18 Pa. C.S. § 4904, that they are authorized to execute this COA on behalf of HAWASA; that HAWASA consents to the entry of this COA and the foregoing Findings as an ORDER of the Department; and that HAWASA hereby knowingly waives its rights to appeal this COA and the foregoing Findings, which rights may be available under Section 4 of the Environmental Hearing Board Act, the Act of July 13, 1988, P.L. 530, No. 1988-94, 35 P.S. § 7514; the Administrative Agency Law, 2 Pa. C.S. § 103(a); and Chapters 5A and 7A, or any other provision of law. Signature by HAWASA's attorney certifies only that the COA has been signed after consulting with counsel.

AUTHORITY

FOR HALIFAX AREA WATER AND SEWER FOR THE COMMONWEALTH OF PENNSYLVANIA DEPARTMENT OF ENVIRONMENTAL PROTECTION:

Name: Title:	Date	Maria D. Bebenek, P.E. Program Manager Clean Water Program	Date
Name:	Date	Beth Liss Shuman	
		Date	

Exhibit 1

Violations of Permitted Effluent Limits

Facility Name: Halifax STP

NPDES Permit No: PA0024457

Date	Parameter	Sample Type	Permit	/ Reported
3/1/2013	Total Suspended Solids	Weekly Average	79 lbs./day	111 lbs./day
3/1/2013	Total Suspended Solids	Average Monthly	30 mg/L	49 mg/L
3/1/2013	Total Suspended Solids	Weekly Average	45 mg/L	130 mg/L
3/1/2013	Fecal Coliform	Geometric Mean	2000/100ml	7951/100ml
6/1/2013	Dissolved Oxygen	Minimum	5 mg/L	4.7 mg/L
6/1/2013	CBOD5	Average Monthly	25 mg/L	25.1 mg/L
6/1/2013	CBOD5	Weekly Average	40 mg/L	57 mg/L
10/1/2013	Dissolved Oxygen	Minimum	5 mg/L	4.5 mg/L
12/1/2013	CBOD5	Weekly Average	40 mg/L	43 mg/L
12/1/2013	Total Suspended Solids	Weekly Average	45 mg/L	120 mg/L
12/1/2013	Total Suspended Solids	Average Monthly	30 mg/L	37 mg/L
4/1/2014	Total Suspended Solids	Weekly Average	45 mg/L	69 mg/L
4/1/2014	Total Suspended Solids	Weekly Average	79 lbs./day	83 lbs./day
5/1/2015	Fecal Coliform	Geometric Mean	200/100ml	1256/100ml
6/1/2015	Fecal Coliform	Geometric Mean	200/100ml	1625/100ml
7/1/2015	Fecal Coliform	Geometric Mean	200/100ml	561/100ml
9/1/2015	Fecal Coliform	Geometric Mean	200/100ml	750/100ml
11/1/2015	Fecal Coliform	Geometric Mean	200/100ml	246/100ml
2/1/2016	Total Suspended Solids	Weekly Average	45 mg/L	76 mg/L
2/1/2016	Total Suspended Solids	Weekly Average	79 lbs./day	124 lbs./day
3/1/2016	Total Suspended Solids	Weekly Average	45 mg/L	52 mg/L
3/1/2016	Total Suspended Solids	Average Monthly	30 mg/L	31 mg/L
5/1/2016	Fecal Coliform	Geometric Mean	200/100ml	929/100ml
5/1/2016	Total Suspended Solids	Weekly Average	45 mg/L	100 mg/L
5/1/2016	Total Suspended Solids	Weekly Average	79 lbs./day	90 lbs./day
5/1/2016	Total Suspended Solids	Average Monthly	30 mg/L	38 mg/L
6/1/2016	Fecal Coliform	Geometric Mean	200/100ml	620/100ml
6/1/2016	Total Suspended Solids	Weekly Average	45 mg/L	88 mg/L

.

6/1/2016 Total Suspended Solids Weekly Average 79 lbs./day 84 lb	lbs /day
	105.7 day
6/1/2016 Total Suspended Solids Average Monthly 30 mg/L 49 m	mg/L
7/1/2016Total Suspended SolidsWeekly Average45 mg/L102	2 mg/L
7/1/2016Total Suspended SolidsWeekly Average79 lbs./day114	lbs./day
7/1/2016Total Suspended SolidsAverage Monthly30 mg/L50 mg/L	mg/L
12/1/2016Total Suspended SolidsWeekly Average45 mg/L51 m	mg/L
1/1/2017 CBOD5 Average Monthly 25 mg/L 34.3	3 mg/L
1/1/2017 CBOD5 Weekly Average 40 mg/L 47 m	mg/L
5/1/2017Fecal ColiformGeometric Mean200/100ml117	71/100ml
5/1/2017Fecal ColiformInstantaneous Maximum1000/100ml5700)0/100ml
6/1/2017Fecal ColiformGeometric Mean200/100ml481/	/100ml
9/1/2017Fecal ColiformInstantaneous Maximum1000/100ml229	90/100ml
9/1/2017Fecal ColiformGeometric Mean200/100ml146	68/100ml

.

EXHIBIT 2

Halifax STP NPDES Permit No. PA0024457

Stipulated penalties for NPDES Permit effluent violations:

	Penalty from execution of COA
Percent over permit limits	through completion of Paragraph 3.d

Monthly Average/Weekly Average/Geometric Average Violations	Assessed Monthly
>0-25%	\$ 100.00
>25.1-50 %	\$ 125.00
>50.1-75 %	\$ 150.00
>75.1-100 %	\$ 175.00
>100.1 %	\$ 200.00

Instantaneous Maximum Violations(*)	Assessed Daily
>0-25%	\$ 100.00
>25.1-50 %	\$ 125.00
>50.1-75 %	\$ 150.00
>75.1-100 %	\$ 175.00
>100.1 %	\$ 200.00

Percent over permit limits

Penalty from completion of Paragraph 3.d through termination of COA

Monthly Average/Weekly Average/Geometric Aver	rage Violations Assessed Monthly
>0-25%	\$ 200.00
>25.1-50 %	\$ 250.00
>50.1-75 %	\$ 300.00
>75.1-100 %	\$ 350.00
>100.1 %	\$ 400.00
Instantaneous Maximum Violations (*)	Assessed Daily

Assessed Daily
\$ 200.00
\$ 250.00
\$ 300.00
\$ 350.00
\$ 400.00

(*) – Instantaneous Maximum Violations are determined from Department inspection results and apply to all but Fecal Coliform Violations. Instantaneous Maximum Fecal Coliform limits are subject to 92a.47 of 25 Pa Code.



August 8, 2017

Fred Ford Halifax Area Water & Sewer Authority PO Box 443 Halifax, PA 17032-0443

Re: 2014 Annual Wasteload Management (Chapter 94) Report Halifax STP NPDES Permit No. PA0024457 Halifax Borough, Dauphin County

Dear Mr. Ford:

The Department of Environmental Protection (DEP) has completed its review of your revised Corrective Action Plan (CAP) dated June 22, 2017 that was submitted in accordance with 25 Pa. Code § 94.21.

The CAP is considered acceptable. DEP appreciates your cooperation in meeting the Chapter 94 reporting requirements.

If you have any questions concerning this notice, please contact Aaron Baar at 717.705.4791 or abaar@pa.gov.

Sincerely,

KWagner

Timothy K. Wagner Environmental Group Manager Clean Water Program

cc: Halifax Borough Halifax Township Herbert, Rowand & Grubic, Inc.

HALIFAX AREA WATER AND SEWER AUTHORITY

PO Box 443, Halifax, PA 17032

Phone: 717-896-3886

Fax: 717-896-3780

June 20, 2017

Mr. Aaron Baar Clean Water Program PA Department of Environmental Protection Southcentral Regional Office 909 Elmerton Avenue Harrisburg, Pennsylvania 17110-8200

Re: NPDES Permit No. PA0024457 Corrective Action Plan Main Pumping Station and Wastewater Treatment Plant Halifax Area Water and Sewer Authority

Dear Mr. Baar:

The Main Pumping Station located at the Halifax Area Water and Sewer Authority (HAWASA) Wastewater Treatment Plant (WWTP) is considered to be hydraulically overloaded by the Pennsylvania Department of Environmental Protection (PA DEP) in accordance with 25 Pa. Code § 94.12. As required by 25 Pa. Code § 94.21, HAWASA submits this Corrective Action Plan (CAP) to reduce the overload condition at the Main Pumping Station. The overload condition at the Main Pumping Station will be eliminated as part of a WWTP Upgrade to be completed by HAWASA.

This CAP has been revised in accordance with your June 13, 2017 communication with Justin Mendinsky, P.E., of Herbert Rowland & Grubic, Inc. (HAWASA Engineering Consultant) and outlines the activities to be completed by HAWASA as part of the WWTP Upgrade and for the elimination of the hydraulic overload condition. As required by 25 Pa Code § 94.21, an Implementation Schedule identifying the anticipated completion date of significant activities proposed as part of the WWTP Upgrade is included with this CAP. The CAP also identifies the HAWASA intended program for the restriction of new connections tributary to the overloaded sewerage facilities.

Written Action Plan to Reduce Overload & Implementation Schedule

The Main Pumping station will be modified as part of an overall WWTP Upgrade to be completed by HAWASA. HAWASA will proceed with the requisite Planning Phase, Design Phase (including Permits submission and receipt), Bid Phase and Construction Phase activities in accordance with the Implementation Schedule provided below.

Mr. Aaron Baar PA Department of Environmental Protection June 20, 2017 Page 2

IMPLEMENTATION SCHEDULE FOR HAWASA	WWTP UPGRADE
TASK DESCRIPTION	COMPLETION / SUBMISSION DATE
Revised CAP Submission to PA DEP	By June 23, 2017
 Complete WWTP Upgrade alternatives review and Design Engineer's Report with the following key components: Review previous HAWASA evaluation of WWTP improvement alternatives Prepare existing and future flow and loading projections including flow metering study as required Request and receive preliminary effluent discharge limits for WWTP Upgrade from PA DEP WWTP Improvements alternatives review Identification and selection of recommended improvements User rates analysis for recommended improvements Preparation of Design Engineer's Report Preparation of Preliminary Engineering % Upiform 	by Julie 23, 2017
Environmental Reports	April 17, 2018
Submit administratively and technically complete Uniform Environmental Report for WWTP Upgrade to PA DEP	April 20, 2018
Begin Design Phase	Within 45 Days of PA DEP approval of Uniform Environmental Report
Submission of administratively and technically complete Water Quality Management Part II Permit Application to PA DEP	Within 180 Days of PA DEP approval of Uniform Environmental Report
Advertise for Construction Bids	Within 90 Days of PA DEP issuance of Water Quality Management Permit
Construction Contract Award	Within 60 Days of Receipt of Bids
Complete Construction	Within 450 Days from Construction Contract Award
12-Month Compliance Monitoring Period	12-Month Period from Construction Completion

This CAP and Implementation Schedule for WWTP Upgrade is submitted by HAWASA predicated on the following information relative to Sewage Facilities Planning which was previously provided by PA DEP:

- 1. Act 537 Sewage Facilities Plan approval will not be required for the submission of a Water Quality Management Part II Permit Application which does not change the current HAWASA sewer service area.
- 2. Act 537 Sewage Facilities Plan Approval will not be required for the submission of a funding application to PENNVEST.

Mr. Aaron Baar PA Department of Environmental Protection June 20, 2017 Page 3

3. Prior to any expansion of the current HAWASA service area, Act 537 Sewage Facilities Planning must be submitted to PA DEP for approval to facilitate new connections outside of the current sewer service area

Restriction on Connections Tributary to Overloaded Sewerage Facilities

As previously discussed with PA DEP staff, HAWASA will limit new connections within the area tributary to the Main Pump Station to a total of twenty-five (25) new EDUs (not otherwise meeting the definitions of 25 Pa Code §§ 94.55, 94.56 and 94.57) during the term of the CAP until the hydraulic overload condition is eliminated. The connection restriction area is shown on the attached Exhibit to this CAP. A summary of new connections made within the CAP area will be included in semi-Annual CAP Update Reports as well Annual Wasteload Management Reports (Chapter 94 Reports) submitted by HAWASA.

There is no restriction on connections in the southern portion of the HAWASA collection system located in Halifax Township as shown on the attached Exhibit as this area is not tributary to the Main Pumping Station.

Semi-Annual Reporting

During the term of the CAP and until such time that the hydraulic overload condition is eliminated, HAWASA will submit semi-annual CAP Update Reports to PA DEP. The initial Update Report will be submitted by September 30, 2017. Following submission of the initial update, the Update Reports will be submitted to PA DEP prior to March 31st of each year, concurrent with the HAWASA submission of its Annual Chapter 94 Report, and again prior to September 30th of each year.

If you have any questions or comments regarding the proposed CAP, please do not hesitate to contact me or our Engineering Consultant, Herbert, Rowland & Grubic, Inc. (ATTN: Justin Mendinsky, P.E.) at (717) 564-1121.

Sincerely,

HALIFAX AREA WATER AND SEWER AUTHORITY

Fred L. Ford, Jr

Chairman

Attachment: CAP Area Exhibit

Cc: Halifax Borough

Halifax Township Supervisors Christian S. Daghir, Esq., Etzweiler and Associates, Solicitor Justin J. Mendinsky, P.E., Herbert, Rowland & Grubic, Inc., Engineer File