

Appendix B

Historical Vortex CSO Flows and WQ Data (2015-2019)

Burlington Main WWTP - Vortex CSO Flows and Water Quality Data 2015-2019

Date	CSO Event			By - Pass		CSO Flow		Storm System Effluent											
	Precip. Inches	Event Hours	Vortex Hours	Gate 1 open minutes	Gate 2 open minutes	Maximum MGD	Total MGD	pH		TRO #1 mg/l	E-Coli col/100ml	BOD mg/l	Set Solids ml/l	NO3-N mg/l	NH3-N mg/l	Total P mg/l	TSS mg/l		
2015																			
January	1/18/2015	0.44	4	2.47	N	N	46.96	2.625	6.88		0.27	200	51	1.5		11.3	1.23	126.5	
March	3/26/2015	0.38	10	2.9	N	N	34.29	2.2409	6.85		0.21	10	76	2.75		20.7	1.68	177.5	
April	4/4/2015	0.43	5.9	1.5	N	N	44.04	1.0596	7.2		0.17	38	54	1.7		18.2	1.47	175.63	
	4/20/2015	0.51	25	1.55	N	N	45.13	1.08	7.13		0.62	10	52	2.25		17.2	1.67	133	
	4/21/2015	0.44	4	3.47	N	N	46.31	2.6089	7.19		0.95	10	33	1		11.8	0.991	117	
	4/22/2015	0.35	10	1.73	N	N	44.97	1.2944	7.1		0.96	10	23	0.75		14.5	0.587	78	
May	5/11/2015	1.15	16.5	5.38	14.3	6	92.54	6.8152	7.21		0.24	10	70	2.6		10.4	1.94	689	
	5/28/2015	0.18	0.5	1.15	N	N	94.7	1.927	7.28		0.1	10	83	5.5		16.3	1.52	411	
	5/30/2015	0.76	7.95	2.95	N	N	63.98	3.508	7.24		0.32	200	45	2.3		7.24	0.993	180	
June	6/1/2015	1.07	13	6.08	N	N	50.09	5.5594	6.77		0.7	10	16	0.6		11.76	0.515	42.5	
	6/5/2015	0.35	1	1.9	N	N	66.63	2.2146	7.17		0.2	10	56	2.2		12.4	1.3	146	
	6/8/2015	1.05	18.4	6.82	N	N	91.61	7.2004	7.38		0.39	10	59	5.75		9.95	1.72	450	
	6/9/2015	1.45	10	7.72	N		10.4	103.23	11.1718	6.87		0.91	50	18	1.6		4.96	0.699	121.2
	6/12/2015	1.69	5.75	8.47	N		97.1	86.04	15.7099	6.94		0.95	10	45	2.5		7.36	0.795	106.75
	6/15/2015	0.48	6	2.52	N	N		32.26	2.1033	6.85		0.57	10	21	0.6		7.15	0.492	30.25
	6/16/2015	0.35	8	2.82	N	N		50.25	2.1259	7.35		0.76	40	29	1.2		7.55	0.755	57.75
	6/19/2015	0.54	3	2.1	N	N		65.73	3.6243	7.1		0.58	20	37	3		0.2	0.866	103.5
	6/21/2015	0.87	24	3.57	N	N		88.64	4.8266	7.05		0.57	10	30	1.5		5.4	0.714	106.25
	6/23/2015	0.36	7	4.62	N	N		68.17	5.4709	7.19		0.96	10	6.7	1		6.98	0.654	75.5
6/28/2015	0.53	18	18	N	N		58.38	3.1498	7.13		0.64	20	27	1.5		7.27	0.629	48.75	
July	7/1/2015	1.39	9.5	10.7	2.2	34.2	100.75	17.79	6.5		0.66	27	38	1.8		4.93	0.784	138.8	
	7/4/2015	0.46	1.08	2.05	N		15.3	100.91	4.0815	6.96		0.93	10	26	2.4		5.27	0.784	204.4
	7/15/2015	0.32	3	0.97	N	N		81.7	1.5093	6.85		0.07	83	59	4.5		7.85	1.66	239
	7/18/2015	0.37	7	1.03	N	N		44.57	0.9672	6.97		0.74	140	35	2.5		6.07	0.888	100
	7/21/2015	0.69	2	2.6	N		11.7	100.95	3.659	6.75		0.4	26	50	3		5.05	1.15	219.5
August	8/11/2015	1.48	1	1.67	N		13.7	97.22	3.53	6.51		0.28	10	47	1.5		4.84	1.04	165
	8/21/2015	0.63	3	1.85	N	N		56.47	3.2078	6.68		0.59	10	28	1		2.41	0.65	75.5
September	9/13/2015	0.47	2	1.22	N	N		87.38	2.3133	6.28		0.4	10	37	1.7		0.601	0.976	155.6
	9/29/2015	3.66	27.5	18.65	9.1	22.8	98.92	27.4188	6.68		0.5	10	27	1.4		3.68	0.876	141.6	
October	10/9/2015	0.63	10	3.48	N	N		47.78	3.4811	6.3		0.51	63	49	3		7.38	1.01	92.8
	10/28/2015	1.66	25.08	6.47	N		12.8	92.42	9.967	6.57		0.91	36	51	1.35		4.56	0.844	52.4
November	11/12/2015	0.33	8	1.7	N	N		38.15	1.0486	6.37		0.29	10	65	3.5		3.71	1.23	186
	11/20/2015	0.47	5	2.2	N	N		56.83	1.971	7.05		0.28	40	27	1.6		10.3	0.608	39
December	12/2/2015	1.47	24	3.5	N	N		45.91	3.27	6.15		0.89	10	25	2		3.36	0.894	100.5
	12/17/2015	0.31	2	1.65	N	N		57.89	1.7643	6.88		0.72	20	72	5		3.9	1.83	221.5
	12/22/2015	0.68	8	4.77	N	N		45.46	4.6852	6.24		0.81	38	49	3		1.61	0.937	117.5
Totals		28.40	336.16	152.23	25.6	224.0		176.980											
Max		3.66	27.50	18.65	14.3	97.1	103.23	27.419	7.38	Jan 1-Mar 31	0.27	200	83	6		20.70	1.94	689.0	
Min		0.18	0.50	0.97	2.2	6.0	32.26	0.967	6.15	Apr 1-Dec 31	0.07	10	7	0.6		0.20	0.49	30.3	
Average		0.79	9.34	4.23	8.5	24.9	67.42	4.916	6.88		0.56	34	42	2.25		7.89	1.04	156.3	
NPDES Permit #3-1331 Combined S/N 001 and S/N 002 Limitations - Instantaneous Maximum									(Jan 1 - Mar 31)	0.83	6160							800	
									(Apr 1 - Dec 31)	0.97									
NPDES S/N Permit #3-1331 S/N 001 Limitations at a 80:1 Dilution Factor as per 1272 Order									6.0 - 8.5		6160	2400	80			64	2400		
Exceedence of Standards?									No	No	No	No	No	No	No	No	No		
Notes:																			
1. Data is from Main WWTP Monthly Operations Reports recorded on dates of CSO Events																			

Burlington Main WWTP - Vortex CSO Flows and Water Quality Data 2015-2019

Date	CSO Event			By - Pass		CSO Flow		Storm System Effluent										
	Precip. Inches	Event Hours	Vortex Hours	Gate 1 open minutes	Gate 2 open minutes	Maximum MGD	Total MGD	pH		TRO #1 mg/l	E-Coli col/100ml	BOD mg/l	Set Solids ml/l	NO3-N mg/l	NH3-N mg/l	Total P mg/l	TSS mg/l	
2016																		
January	1/10/2016	0.72	13.07	3.08	N	N	82.79	4.0069	6.16		0.64	40	45	2.9		1.37	1.08	239.4
February	2/16/2016	0.56	9.1	3.65	N	N	94.94	6.614	6.97		0.6	46	79	4.5		11	2.28	3.76
	2/24/2016	2.11	26.5	20.33	N	8.89	100.87	36.5201	6.28		0.78	10	36	2.1		12.1	1.09	171.5
March	3/10/2016	0.47	15	0.95	N	N	18.48	0.6744	7.48		0.29	10	22	0.1		23.4	1.27	34.75
	3/16/2016	0.36	6	1.15	N	N	42.86	1.1856	7.17		0.24	10	41	2.25		15	0.602	194.5
	3/28/2016	0.54	9	0.98	N	N	36.18	1.025	7.06		0.52	10	33	0.8		16.3	0.675	68.13
May	5/2/2016	0.48	4	2.48	N	N	57.2	2.581	7.13		0.52	23	44	1.3		15.1	0.731	104.5
	5/8/2016	0.42	2	1.9	N	N	56.35	2.131	7.08		0.28	10	51	3.25		18.4	1.01	151.5
June	6/5/2016	1.71	14.5	5.25	0.4	58.9	97.5	9.9415	7.12		0.46	20	97	5.25		14.7	1.57	267.5
	6/22/2016	0.41	2	1.88	N	N	90.68	2.3189	6.83		0.22	13	60	5.5		14	1.32	219.4
	6/28/2016	0.53	12	1.58	N	N	59.35	1.71	6.28		0.28	50	51	2.55		15.3	1.18	166.5
July	7/10/2016	0.66	1.5	0.93	N	N	32.5	0.84	6.15		0.6	10	35	2		2.63	1.6	78
	7/14/2016	1.21	1.1	1.97	4.5	29	97.54	4.5654	6.21		0.19	10	53	3		1.84	0.19	360
	7/18/2016	0.43	10	0.65	N	N	66.14	0.667	6.36		0.28	93	110	5		1.72	1.39	215
	7/22,23/16	0.48	9	0.85	N	3.3	98.19	6.3701	6.45		0.23	400	130	6.6		2.19	2.07	376
August	8/13/2016	0.48	5.05	1.05	N	N	61.63	1.449	6.26		0.36	100	87	7		0.331	2.27	348
	8/16/2016	0.61	9	1.73	N	N	49.4	1.9887	6.53		0.49	13	35	2.5		13.4	1.47	111
September	9/11/2016	0.42	3	1.13	N	N	94.86	2.4101	6.39		0.34	2	120	10		1.78	3.53	687
	9/23/2016	0.28	3.9	0.58	N	N	48.79	0.6467	6.8		0.86	20	43	1.9		6.22	1.6	102
October	10/22/2016	0.88	17.75	2.08	N	N	56.79	2.6423	6.6		0.8	113	110	5.5		5.37	1.55	181.5
	10/29/2016	0.23	5.5	1.03	N	N	41.68	0.9296	6.84		0.45	10	74	2.5		0.07	1.29	129
November	11/3/2016	0.63	22	2.25	N	N	32.91	2.2243	6.92		0.96	55	63	3.5		12.2	1.31	104.5
December	12/1/2016	0.35	0.75	1.5	N	N	41.44	1.46	6.89		0.47	10	67	4.25	14.9		5.17	290
	12/18/2016	0.55	3.5	2.17	N	N	83.28	2.8598	7.09		0.29	10	87	3.5	15.1		1.22	241.25
Totals		15.52	205.22	61.15	4.9	100.1		97.761										
Max		2.11	26.50	20.33	4.5	58.9	100.87	36.520	7.48	Jan 1-Mar 31	0.78	400	130	10.0	15.10	23.40	5.17	687.0
										Apr 1-Dec 31	0.96							
Min		0.23	0.75	0.58	0.4	3.3	18.48	0.647	6.15		0.19	2	22	0.10	14.90	0.07	0.190	3.8
Average		0.65	8.55	2.55	2.5	25.0	64.26	4.073	6.71		0.46	45	66	3.66	15.00	9.29	1.561	201.9
NPDES Permit #3-1331 Combined S/N 001 and S/N 002 Limitations - Instantaneous Maximum										(Jan 1 - Mar 31)	0.83	6160						800
										(Apr 1 - Dec 31)	0.97							
NPDES S/N Permit #3-1331 S/N 001 Limitations at a 80:1 Dilution Factor as per 1272 Order									6.0 - 8.5			6160	2400	80			64	2400
Exceedence of Standards?									No		No	No	No	No			No	No
Notes:																		
1. Data is from Main WWTP Monthly Operations Reports recorded on dates of CSO Events																		

Burlington Main WWTP - Vortex CSO Flows and Water Quality Data 2015-2019

Date	CSO Event			By - Pass		CSO Flow		Storm System Effluent										
	Precip. Inches	Event Hours	Vortex Hours	Gate 1 open minutes	Gate 2 open minutes	Maximum MGD	Total MGD	pH	TRO #1 mg/l	E-Coli col/100ml	BOD mg/l	Set Solids ml/l	NO3-N mg/l	NH3-N mg/l	Total P mg/l	TSS mg/l		
2017																		
January	1/24/2017	0.26	4.5	3	N	N	45.09	3.398	7.12		0.63	58	72	2		16.3	1.22	138.125
February	2/25/2017	1	8.03	6.05	N	N	84.3	10.645	7.11		0.75	10	53	3.5	6.04		1.24	367
March	3/1/2017	0.25	6	0.79	N	N	41.76	0.652	7.1		0.74	10	50	0.3		16.9	0.92	163.125
	3/27/2017	0.52	6	2.25	N	N	42.13	1.957	7.06		0.47	10	98	18.5		14.1	3.4	288
April	4/1/2017		24	0.62	N	N	14.42	0.252	6.94		0.45	20	92	30	10.9		3.43	179
	4/2/2017		1.25	1.25	N	N	14.42	0.606	7.01		0.51	20	28		3.18		0.677	28.8
	4/4/2017	0.23	4.25	2.47	N	N	31.89	1.975	7.09		0.79	20	77	9	9.18		2.61	161.25
	4/6/2017	1.07	22.25	14.1	N	N	91.04	12.817	7.05		0.7	10	17	0.05	9.82		0.361	18.5
	4/7/2017	0.24	21.5	4.6	N	N	17.63	2.992	7.07		0.65	10	34	0.7	6.74		0.809	65.2
	4/15/2017	0.41	6	1.92	N	N	59.07	1.996	6.85		0.23	10	42	7.5	15.4		0.847	70
	4/19/2017	0.35	5	1.52	N	N	58.22	1.673	6.78		0.96	10	30	2	16.9		0.699	82.5
4/21/2017	0.35	4	1.97	N	N	55.41	1.720	6.51		0.55	10	22	0.5	11.9		0.417	51.6	
May	5/1/2017	0.74	4	3.18	N	N	86.49	4.474	7.08		0.93	10	65	5.4		11.7	1.59	363
	5/5/2017	0.4	4	2.87	N	N	43.39	2.154	7.04		0.59	10	32	0.6		16.54	0.643	69
	5/22/2017	0.43	6	1.78	N	N	83.77	2.895	7.2		0.84	10	78	4	10.68	1.42	312	
	5/29/2017	0.34	8	0.92	N	N	19.13	0.639	6.82		0.67	10	24	0.2	19.02	0.371	37	
	5/30/2017	0.61	4	3.77		16	19	95.38	5.937	6.88		0.39	10	33	1.6	11.6	0.525	83
June	6/6/2017	0.85	10	6.75	N	N	31.28	6.089	6.74		0.31	20	41	1.75		9.5	0.716	104.8
	6/18/2017	1.73	21	5.95		15.4	47	100.91	8.731	6.53		0.22	20	80	6.5	1.68	1.86	458.5
	6/20/2017	0.59	0.3	1.75	N		15.4	100.91	3.346	6.51		0.59	10	30	1.7	1.06	0.89	255
	6/23/2017	1.49	8.5	8.03	N	N		87.1	11.977	6.83		0.74	10	32	2.1	1.18	0.83	104
	6/29/2017	2.32	10	17.13	N		33.5	104.57	29.319	6.94		0.77	100	41	3.5	1.45	0.71	109.2
July	7/8/2017	1.32	6	4.07		6	37.5	99.13	7.418	6.83		0.68	27	52	3	2.15	1.04	235
	7/17/2017	0.92	4.7	3.85	N	N		97.99	6.875	6.65		0.18	60	51	3.1	0.93	1.27	294
	7/24/2017	1.15	8	5.62	N	N		45.62	4.267	6.78		0.28	75	27	0.25	3.16	0.56	37
	7/27/2017	0.29	5	1.05	N	N		88.77	1.889	6.68		0.87	50	37	5.5	2.29	0.97	200
August	8/7/2017	0.62	11.75	1.58	N	N		56.55	1.431	6.58		0.06	10	85	1.25	1.04	0.85	174
	8/18/2017	0.71	3	2.43	N	N		45.836	2.631	6.68		0.47	20	63	1.75	3.68	1.05	99.2
	8/22/2017	0.89	3	1.85		3	18	100.14	3.632	6.65		0.51	10	41	3	1.34	1.21	331
September	9/3/2017	1.1	14	4.58	N	N		43.92	3.205	6.62		0.43	20	41	0.25	4.04	1.52	60.8
	9/5/2017	0.64	6.08	3.22	N	N		61.99	3.671	6.57		0.9	50	39	2.25	1.93	0.72	100.4
	9/8/2017	0.51	2.54	1.72	N	N		56.88	1.329	6.68		0.36	20	39	2	3.49	0.85	148
October	10/9/2017	1.08		5.03	N	N		86.82	8.732	7.07		0.56	40	42	1.3	5.24	1.08	107.6
	10/26/2017	0.95	13.5	3.27	N	N		57.00	4.046	6.91		0.48	20	44	2.75	6.47	0.921	95.6
	10/30/2017	0.74	19	2.05	N	N		44.16	1.445	6.43		0.31	36	39	1.5	2.68	0.77	63.2
Totals		25.10	285.15	132.99	40.4	170.4		166.810										
Max		2.32	24.00	17.13	16.0	47.0	104.57	29.319	7.20	Jan 1-Mar 31	0.75	100	98	30	16.90	19.02	3.43	458.5
										Apr 1-Dec 31	0.96							
Min		0.23	0.30	0.62	3.0	15.4	14.42	0.252	6.43		0.06	10	17	0.05	3.18	0.93	0.36	18.5
Average		0.76	8.39	3.80	10.1	28.4	62.66	4.766	6.84		0.56	24	48	3.80	10.01	6.54	1.11	155.8
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Exceedence of Standards?									No		No	No	No	No		No	No	
Notes:																		
1. Data is from Main WWTP Monthly Operations Reports recorded on dates of CSO Events																		

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2018																					
January	1/11/2018	0.50	16.00	7.62	N	5.10	87.95	9.964	6.70		0.55	10	81	81.00	6.80	2.14	163				
	1/23/2018	0.36	17.00	7.62	N	N	40.46		6.70		0.58	6,000	81	65.00	6.50	1.18	236				
March	3/30/2018	0.36	3.08	2.22	N	N	30.75	1.402	7.16		0.29	26	76	13.00	18.60	1.90	119				
April	4/13/2018	0.66	7.25	6.25	N	N	58.78	3.581	6.89		0.58	100	37	2.50	14.30	0.90	47				
	4/16/2018	0.89	22.25	7.92	N	N	64.92	7.138	7.10		0.01	28,000	140	43.00	12.50	4.81	278				
	4/25/2018	1.04	23.00	7.45	N	N	64.92	5.476	7.01		0.35	10	56	36.00	18.00	0.51	46				
	4/29/2018	0.90	22.00	8.38	N	N	57.32	6.435	6.74		0.90	20	44	1.25	6.99	0.76	70				
May	5/15/2018	0.67	5.00	3.88	N	N	46.80	3.684	7.14		0.72	10	50	1.00	13.90	1.28	152				
June	6/1/2018	0.23	1.00	1.02	N	N	62.08	1.107	7.11		0.03	13,714	98	1.37	12.40	3.68	369				
	6/4/2018	0.21	7.00	1.53	N	N	38.76	0.981	6.96		0.01	4,333	100	32.00	19.50	4.50	256				
	6/18/2018	2.03	8.00	8.18	N	80.20	98.39	17.551	6.69		0.58	10	44	4.50	3.59	1.37	379				
	6/28/2018	1.14	16.00	4.68	N	N	67.15	6.352	6.82		0.44	25	25	1.70	2.91	0.97	86				
July	7/6/2018	0.34	1.80	1.63	N	N	38.03	1.252	7.10		0.68	10	43	0.40	16.30	3.86	75				
	7/10/2018	0.43	0.75	1.98	N	N	104.89	3.574	7.09		0.48	10	27	1.25	18.30	4.17	95				
	7/25/2018	1.78	4.38	5.05	23.00	44.00	104.69	9.850	6.91		0.36	10	18	1.20	1.13	0.81	139				
August	8/7/2018	0.28	1.00	1.37	N	N	80.56	1.654	6.67		0.01	10	64	5.00	1.38	1.45	215				
	8/15/2018	0.82	12.00	2.38	N	N	84.87	2.380	6.98		0.76	40	43	1.30	1.91	1.01	184				
	8/17/2018	1.25	18.00	2.68	7.30	22.50	100.91	4.890	6.79		0.35	10	34	1.20	2.01	0.77	137				
September	9/6/2018	0.58	2.92	1.93	N	N	95.06	3.501	6.86		0.31	10	35	2.20	1.52	0.89	123				
	9/11/2018	1.00	11.00	4.17	N	N	61.91	5.737	6.86		0.90	210	13	0.10	2.90	0.31	24				
	9/21/2018	0.77	3.92	4.58	N	8.00	99.21	5.576	6.73		0.66	20	23	1.50	2.33	0.84	74				
	9/26/2018	1.23	2.50	3.45	1.20	33.60	99.69	7.965	6.40		0.79	10	23	1.80	2.75	0.78	105				
October	10/2/2018	0.81	6.50	4.92	N	N	46.39	4.552	6.54		0.75	40	28	1.60	1.87	0.76	67				
	10/11/2018	1.45	14.00	12.03	N	45.10	95.71	10.885	6.56		0.27	60	35	3.00	1.02	0.99	85				
	10/27/2018	0.63	5.00	2.42	N	N	32.62	2.124	6.54		0.56	10	48	3.50	3.81	0.93	77				
November	11/1/2018	0.90	11.00	5.88	N	N	44.93	4.150	6.65		0.78	10	38	4.00	4.23	0.85	109				
	11/3/2018	1.08	16.00	7.25	N	N	60.00	9.255	6.42		0.61	20	29	1.00	0.79	0.66	55				
	11/6/2018	0.24	4.25	1.20	N	N	31.85	0.898	6.64		0.62	10	44	1.50	3.23	0.76	69				
December	12/3/2018	0.18	0.50	1.08	N	N	44.20	0.781	6.94		0.56	10	30	0.70	1.69	2.90	108				
	12/21/2018	0.77	35.00	6.88	N	N	40.63	3.933	6.52		0.50	10	31	1.25	4.73	0.84	115				
Totals		23.53	298.1	137.63		31.5	238.5		146.627												
Max		2.03	35.00	12.03		23.00	80.20		104.89		17.551										
									7.16	Jan 1-Mar 31	0.58	28,000	140	81	19.50	4.81	379				
										Apr 1-Dec 31	0.90										
Min		0.18	0.50	1.02		1.20	5.10		30.75		0.781		6.40		0.01	10	13	0.10	0.79	0.31	24
Average		0.78	9.94	4.59		10.50	34.07		66.15		5.056		6.81		0.50	1,759	48	10.49	6.93	1.59	135
NPDES Permit #3-1331 Combined S/N 001 and S/N 002 Limitations - Instantaneous Maximum									(Jan 1 - Mar 31)		0.83	6160					800				
									(Apr 1 - Dec 31)		0.97										
NPDES S/N Permit #3-1331 S/N 001 Limitations at a 80:1 Dilution Factor as per 1272 Order										6.0 - 8.5			6160	2400	80		64	2400			
Exceedence of Standards?									No		No	Yes	No	Yes		No	No				
Date of Exceedences												4/16/2018		1/11/2018							
												6/1/2018									
Notes:																					
1. Data is from Main WWTP Monthly Operations Reports recorded on dates of CSO Events																					

Burlington Main WWTP - Vortex CSO Flows and Water Quality Data 2015-2019

Date	CSO Event			By - Pass		CSO Flow		Storm System Effluent										
	Precip. Inches	Event Hours	Vortex Hours	Gate 1 open minutes	Gate 2 open minutes	Maximum MGD	Total MGD	pH		TRO #1 mg/l	E-Coli col/100ml	BOD mg/l	Set Solids ml/l	NO3-N mg/l	NH3-N mg/l	Total P mg/l	TSS mg/l	
2019																		
January	1/1/2019	0.40	10.27	2.12	N	N	41.84	1.422	6.93		0.66	10	50	1.00		7.17	0.74	45
	1/8/2019	0.29	6.01	1.55	N	N	45.13	1.171	7.01		0.74	10	30	0.30		6.15	0.62	64
	1/24/2019	1.02	11.00	12.05	N	N	62.44	17.573	6.92		0.59	10	90	7.50		7.70	1.66	446
February	2/5/2019	0.08	12.33	12.33	N	N	46.15	7.926	7.20		0.63	10	48	2.00		17.34	1.24	192
	2/8/2019	0.05	1.00	1.75	N	N	28.68	0.929	6.81		0.43	10	29	0.90		10.80	0.91	61
	2/24/2019	0.28	15.00	2.13	N	N	45.22	1.594	6.98		0.82	13	88	6.00		14.30	2.07	412
March	3/14/2019	0.00	3.13	3.13	N	N	28.36	1.609	7.20		0.37	20	66	2.00		19.70	1.20	178
	3/15/2019	0.00	4.65	4.65	N	N	27.38	2.130	6.89		0.72	10	42	1.50		8.57	1.36	115
	3/22/2019	0.92	16.00	3.62	N	N	43.02	2.237	7.26		0.46	200	43	0.10		15.50	0.70	60
April	4/15/2019	0.30	3.00	1.55	N	N	75.40	1.799	6.75		0.52	10	76	5.00		13.00	2.07	915
	4/20/2019	1.03	21.00	5.23	N	N	43.02	4.599	6.87		0.60	27	52	2.50		11.40	1.42	163
	4/27/2019	0.80	15.00	9.83	N	N	52.65	6.217	6.82		0.44	27	32	0.50		11.30	0.61	66
May	5/3/2019	0.28	4.66	1.60	N	N	42.90	1.116	6.54		0.48	73	19	T		12.10	0.76	73
	5/10/2019	1.09	15.05	11.37	N	N	89.98	13.100	6.82		0.95	12	49	3.00		8.35	1.39	388
	5/14/2019	0.47	7.50	2.25	N	N	29.58	1.226	6.86		0.50	20	27	0.75		13.40	0.72	37
	5/19/2019	0.70	11.63	3.97	N	N	83.00	4.721	6.81		0.52	10	23	1.00		12.20	0.81	258
	5/25/2019	0.90	17.00	6.28	N	N	80.72	7.930	7.09		0.77	10	46	1.20		11.40	0.51	94
	5/28/2019	0.50	8.00	4.48	N	N	29.78	3.050	6.91		0.79	10	33	0.50		11.60	0.81	48
June	6/2/2019	0.27	5.00	1.58	N	N	85.48	1.945	6.04		0.42	84	27	1.00		9.70	0.75	129
	6/5/2019	1.05	30.00	5.05	N	N	32.50	3.043	6.90		1.05	20	17	0.05		9.21	0.40	28
	6/11/2019	0.84	9.00	4.73	N	N	61.55	5.335	6.62		0.78	20	39	2.00		6.87	0.89	98
	6/20/2019	1.08	12.57	5.27	N	24.10	96.40	10.032	6.39		0.79	10	59	3.25		3.18	1.46	290
	6/25/2019	0.32	2.00	1.58	N	N	58.99	1.640	6.71		0.60	50	85	2.40		2.48	2.09	190
	6/26/2019	0.38	0.97	1.60	N	N	92.06	2.764	6.85		0.44	40	38	3.20		2.58	0.45	213
July	6/29/2019	0.34	4.25	1.58	N	N	50.54	1.435	7.03		0.79	30	29	0.70		2.06	0.64	73
	7/11/2019	0.91	5.00	3.30	3.00	17.40	95.10	5.055	6.64		0.56	10	54	1.25		7.25	1.55	198
	7/17/2019	0.32	2.90	1.52	N	N	58.91	1.307	6.80		0.34	220	27	0.90		2.18	0.84	73
August	7/28/2019	0.94	2.28	3.26	16.00	24.50	102.54	4.395	6.92		0.89	30	53	12.00		16.00	1.14	190
	8/21/2019	0.88	4.00	2.15	N	27.70	95.43	4.260	7.30		0.58	20	53	1.50		7.89	1.16	161
September	9/2/2019	1.21	17.50	3.38	N	N	88.44	4.338	6.77		0.76	10	47	1.60		3.34	0.81	68
	9/4/2019	0.27	1.75	2.02	N	N	59.48	1.748	6.69		0.39	33	33	2.00		2.23	0.78	84
	9/8/2019	0.45	10.50	2.03	N	N	63.58	2.127	6.72		0.28	13	16	1.50		2.60	0.31	10
	9/23/2019	1.01	7.00	3.27	N	26.20	95.47	5.941	6.95		0.52	100	58	2.25		2.10	1.12	233
October	9/26/2019	0.42	4.00	2.02	N	N	58.30	2.277	6.90		0.69	36	35	1.60		2.60	0.78	87
	10/1/2019	0.88	6.50	3.28	N	N	85.80	5.607	7.03		0.56	10	36	2.20		22.10	3.46	112
	10/7/2019	0.99	13.00	9.48	N	N	83.36	9.592	6.92		0.56	67	39	2.50		6.36	0.93	96
	10/17/2019	2.38	23.00	15.67	N	N	79.42	18.541	7.07		0.67	10	28	2.00		7.99	0.77	60
	10/27/2019	0.75	4.00	4.20	N	N	58.62	5.531	6.94		0.78	20	40	3.25		2.59	1.14	62
November	10/31/2019	3.52	13.00	20.50	156.10	86.80	94.90	34.569	6.82		0.89	40	38	1.90		3.45	0.79	87
December	11/27/2019	1.01	12.50	8.85	N	N	46.15	7.693	6.86		0.42	10	46	1.00		4.87	0.57	59
	12/30/2019	0.60	10.00	4.07	N	N	28.60	1.961	7.01		0.36	10	49	1.90		5.93	0.91	97
Totals		29.93	382.95	200.28	175.1	206.7		221.482										
Max		3.52	30.00	20.50	156.10	86.80	102.54	34.569	7.30	Jan 1 - Mar 31	0.82	220	90	12		22.10	3.46	915
										Apr 1 - Dec 31	1.05							
Min		0.05	0.97	1.52	3.00	17.40	27.38	0.929	6.04		0.28	10.00	16.00	0.05		2.06	0.31	9.50
Average		0.73	9.34	4.88	58.37	34.45	62.61	5.402	6.87		0.61	34	44	2.19		8.48	1.06	154
NPDES Permit #3-1331 Combined S/N 001 and S/N 002 Limitations - Instantaneous Maximum										(Jan 1 - Mar 31)	0.83	6160						800
										(Apr 1 - Dec 31)	0.97							
NPDES S/N Permit #3-1331 S/N 001 Limitations at a 80:1 Dilution Factor as per 1272 Order										6.0 - 8.5		6160	2400	80			64	2400
Exceedence of Standards?										No	Yes	No	No	No		No	Yes	
Date of Exceedences											6/5/2019						4/15/2019	
Notes:																		
1. Data is from Main WWTP Monthly Operations Reports recorded on dates of CSO Events																		