

Wastewater Discharge Monitoring Long Report

For DNR Use Only

Facility Name: HEART OF THE VALLEY METRO SEWERAGE DISTRICT
 Contact Address: 801 Thilmany Rd
 Kaukauna, WI 54130
 Facility Contact: Brian Helming, District Director
 Phone Number: 920-766-5731
 Reporting Period: 09/01/2022 - 09/30/2022
 Form Due Date: 10/21/2022
 Permit Number: 0031232

Date Received:
 DOC: 498285
 FIN: 6375
 FID: 445005220
 Region: Northeast Region
 Permit Drafter: Sarah J Adkins
 Reviewer: Barti Oumarou
 Office: Oshkosh

	Sample Point	701	001	701	701	701
	Description	Influent	Effluent	Influent	Influent	Influent
	Parameter	211	211	66	457	87
	Description	Flow Rate	Flow Rate	BOD5, Total	Suspended Solids, Total	Cadmium, Total Recoverable
	Units	MGD	MGD	mg/L	mg/L	ug/L
	Sample Type	CONTINUOUS	CONTINUOUS	24 HR FLOW PROP	24 HR FLOW PROP	24 HR FLOW PROP
	Frequency	DAILY	DAILY	5/WEEK	5/WEEK	MONTHLY
Sample Results	Day 1	5.872	2.554	272	252	
	2	5.700	2.273	360	276	
	3	4.794	1.303	264	168	
	4	4.575	1.518	262	160	
	5	5.283	2.227	272	192	
	6	5.242	2.055	334	260	
	7	5.249	1.863	360	216	<1.3
	8	5.213	1.840	392	332	
	9	4.984	1.597	348	248	
	10	5.146	1.679	254	192	
	11	11.613	8.561	168	136	
	12	12.555	9.669	124	104	
	13	9.899	6.612	207	148	
	14	8.008	4.387	197	152	
	15	7.649	4.452	248	192	
	16	6.941	3.546	210	152	
	17	6.313	3.152	265	156	
	18	6.479	3.079	206	176	
	19	6.107	2.769	245	212	
	20	7.249	4.182	260	204	
	21	6.570	3.468	294	228	
	22	6.016	2.921	268	176	
	23	5.911	4.322	341	212	
	24	5.555	4.690	252	164	
	25	5.953	5.953	294	260	
	26	5.690	5.690	264	216	
	27	5.395	5.395	296	232	
	28	5.249	5.249	294	276	
	29	5.302	5.302	358	224	
	30	5.170	5.170	394	184	
	31					

	Sample Point	701	001	701	701	701
	Description	Influent	Effluent	Influent	Influent	Influent
	Parameter	211	211	66	457	87
	Description	Flow Rate	Flow Rate	BOD5, Total	Suspended Solids, Total	Cadmium, Total Recoverable
	Units	MGD	MGD	mg/L	mg/L	ug/L
Summary Values	Monthly Avg	6.3894	3.915933333	276.766666667	203.333333333	0
	Daily Max	12.555	9.669	394	332	<1.3
	Daily Max - Variable					
	Daily Min	4.575	1.303	124	104	<1.3
	Geometric Mean -					
	Geometric Mean -					
	Week 1 Avg					
	Week 2 Avg					
	Week 3 Avg					
	Week 4 Avg					
Limit(s) in Effect	Monthly Avg					
	Daily Max					
	Daily Max - Variable					
	Daily Min					
	Geometric Mean -					
	Geometric Mean -					
	Weekly Avg					
QA/QC Information	LOD					1.3
	LOQ					5
	QC Exceedance	N	N	Y	N	N
	Lab Certification			445005220	445005220	405132750

	Sample Point	701	701	701	001	701
	Description	Influent	Influent	Influent	Effluent	Influent
	Parameter	133	147	264	66	315
	Description	Chromium, Total Recoverable	Copper, Total Recoverable	Lead, Total Recoverable	BOD5, Total	Nickel, Total Recoverable
	Units	ug/L	ug/L	ug/L	mg/L	ug/L
	Sample Type	24 HR FLOW PROP	24 HR FLOW PROP	24 HR FLOW PROP	24 HR FLOW PROP	24 HR FLOW PROP
	Frequency	MONTHLY	MONTHLY	MONTHLY	DAILY	MONTHLY
Sample Results	Day 1				9	
	2				10	
	3				8	
	4				7	
	5				10	
	6				9	
	7	12.4	76.8	<5.9	10	9.0
	8				11	
	9				16	
	10				11	
	11				11	
	12				9	
	13				7	
	14				7	
	15				9	
	16				11	
	17				12	
	18				13	
	19				14	
	20				13	
	21				15	
	22				14	
	23				15	
	24				12	
	25				13	
	26				11	
	27				14	
	28				8	
	29				10	
	30				12	
	31					

	Sample Point	701	701	701	001	701
	Description	Influent	Influent	Influent	Effluent	Influent
	Parameter	133	147	264	66	315
	Description	Chromium, Total Recoverable	Copper, Total Recoverable	Lead, Total Recoverable	BOD5, Total	Nickel, Total Recoverable
	Units	ug/L	ug/L	ug/L	mg/L	ug/L
Summary Values	Monthly Avg	12.4	76.8	0	11.0333333333	9
	Daily Max	12.4	76.8	<5.9	16	9
	Daily Max - Variable					
	Daily Min	12.4	76.8	<5.9	7	9
	Geometric Mean -					
	Geometric Mean -					
	Week 1 Avg				9	
	Week 2 Avg				10.285714286	
	Week 3 Avg				12.428571429	
	Week 4 Avg				12.428571429	
Limit(s) in Effect	Monthly Avg				30	0
	Daily Max					
	Daily Max - Variable					
	Daily Min					
	Geometric Mean -					
	Geometric Mean -					
	Weekly Avg				45	0
QA/QC Information	LOD	2.5	3.4	5.9		2.6
	LOQ	10	10	20		10
	QC Exceedance	N	N	N	N	N
	Lab Certification	405132750	405132750	405132750	445005220	405132750

	Sample Point	701	001	001	001	001
	Description	Influent	Effluent	Effluent	Effluent	Effluent
	Parameter	553	377	204	112	457
	Description	Zinc, Total Recoverable	pH Field	Fecal Coliform	Chlorine, Total Residual	Suspended Solids, Total
	Units	ug/L	su	#/100ml	ug/L	mg/L
	Sample Type	24 HR FLOW PROP	GRAB	GRAB	GRAB	24 HR FLOW PROP
	Frequency	MONTHLY	5/WEEK	WEEKLY	5/WEEK	5/WEEK
Sample Results	Day 1		7.1	70	<100	15.6
	2		6.8		<100	16.0
	3		7.5			18.0
	4		7.4			15.2
	5		7.7		<100	14.8
	6		7.1		<100	16.4
	7	150	7.1		<100	14.8
	8		7.2	55	<100	13.2
	9		7.2		<100	14.4
	10		7.1			14.4
	11		7.3			19.2
	12		7.3		<100	19.2
	13		7.1		<100	11.2
	14		7.1		<100	12.4
	15		7.3	45	<100	15.6
	16		7.3		<100	14.8
	17		7.3			22.8
	18		7.6			23.6
	19		7.3		<100	25.2
	20		7.2		<100	20.4
	21		7.2		<100	28.8
	22		7.1		<100	34.0
	23		7.3	275	<100	30.4
	24		7.5			31.2
	25		7.4			28.0
	26		7.3		<100	28.4
	27		7.3		<100	28.4
	28		7.2		<100	28.4
	29		7.1		<100	27.6
	30		7.3		<100	25.2
	31					

	Sample Point	701	001	001	001	001		
	Description	Influent	Effluent	Effluent	Effluent	Effluent		
	Parameter	553	377	204	112	457		
	Description	Zinc, Total Recoverable	pH Field	Fecal Coliform	Chlorine, Total Residual	Suspended Solids, Total		
	Units	ug/L	su	#/100ml	ug/L	mg/L		
Summary Values	Monthly Avg	150	7.256666667	111.25	0	20.92		
	Daily Max	150	7.7	275	<100	34		
	Daily Max - Variable							
	Daily Min	150	6.8	45	<100	11.2		
	Geometric Mean -			83.080955814				
	Geometric Mean -			70				
	Week 1 Avg				0	15.828571429		
	Week 2 Avg				0	14.857142857		
	Week 3 Avg				0	21.6		
	Week 4 Avg				0	29.828571429		
Limit(s) in Effect	Monthly Avg				38	0	30	0
	Daily Max		9	0		38	0	
	Daily Max - Variable							
	Daily Min		6	0				
	Geometric Mean -			400	0			
	Geometric Mean -			656	0			
	Weekly Avg					38	0	45
QA/QC Information	LOD	11.6				100		
	LOQ	40				100		
	QC Exceedance	N	N	N	N	N	N	N
	Lab Certification	405132750						445005220

	Sample Point	001	001	001	001	001
	Description	Effluent	Effluent	Effluent	Effluent	Effluent
	Parameter	457	1348	1347	388	388
	Description	Suspended Solids, Total	WQT Credits Used (TSS)	WQT Computed Compliance (TSS)	Phosphorus, Total	Phosphorus, Total
	Units	lbs/day	lbs/month	lbs/day	mg/L	lbs/day
	Sample Type	CALCULATED	CALCULATED	CALCULATED	24 HR FLOW PROP	CALCULATED
	Frequency	5/WEEK	MONTHLY	5/WEEK	5/WEEK	5/WEEK
Sample Results	Day 1	332	0	332	0.35	7.46
	2	303	0	303	0.37	7.01
	3	196	0	196	0.35	3.80
	4	192	0	192	0.33	4.18
	5	275	0	275	0.38	7.06
	6	281	0	281	0.37	6.34
	7	230	0	230	0.37	5.75
	8	203	0	203	0.32	4.91
	9	192	0	192	0.36	4.79
	10	202	0	202	0.21	2.94
	11	1371	0	1371	0.36	25.70
	12	1548	0	1548	0.33	26.61
	13	618	0	618	0.27	14.89
	14	454	0	454	0.28	10.24
	15	579	0	579	0.28	10.40
	16	438	0	438	0.47	13.90
	17	599	0	599	0.40	10.52
	18	606	0	606	0.42	10.79
	19	582	0	582	0.39	9.01
	20	712	0	712	0.38	13.25
	21	833	0	833	0.46	13.30
	22	828	0	828	0.57	13.89
	23	1096	0	1096	0.55	19.83
	24	1220	0	1220	0.47	18.38
	25	1390	0	1390	0.44	21.85
	26	1348	0	1348	0.56	26.57
	27	1278	0	1278	0.52	23.40
	28	1243	0	1243	0.50	21.89
	29	1220	0	1220	0.54	23.88
	30	1087	0	1087	0.54	23.28
	31					

	Sample Point	001	001	001	001	001	
	Description	Effluent	Effluent	Effluent	Effluent	Effluent	
	Parameter	457	1348	1347	388	388	
	Description	Suspended Solids, Total	WQT Credits Used (TSS)	WQT Computed Compliance (TSS)	Phosphorus, Total	Phosphorus, Total	
Units	lbs/day	lbs/month	lbs/day	mg/L	lbs/day		
Summary Values	Monthly Avg	715.2	0	715.2	0.404666667	13.527333333	
	Daily Max	1548	0	1548	0.57	26.61	
	Daily Max - Variable						
	Daily Min	192	0	192	0.21	2.94	
	Geometric Mean -						
	Geometric Mean -						
	Week 1 Avg			258.428571429			
	Week 2 Avg			655.428571429			
	Week 3 Avg			621.285714286			
	Week 4 Avg			1200.428571429			
Limit(s) in Effect	Monthly Avg			801	0	1	0
	Daily Max						
	Daily Max - Variable						
	Daily Min						
	Geometric Mean -						
	Geometric Mean -						
	Weekly Avg			1345	0		
QA/QC Information	LOD					0.026	
	LOQ					0.087	
	QC Exceedance	N	N	N	N	N	N
	Lab Certification					445005220	

	Sample Point	001	001	001	001	001
	Description	Effluent	Effluent	Effluent	Effluent	Effluent
	Parameter	789	87	133	147	264
	Description	Nitrogen, Ammonia (NH3-N) Total	Cadmium, Total Recoverable	Chromium, Total Recoverable	Copper, Total Recoverable	Lead, Total Recoverable
	Units	mg/L	ug/L	ug/L	ug/L	ug/L
	Sample Type	24 HR FLOW PROP	24 HR FLOW PROP	24 HR FLOW PROP	24 HR FLOW PROP	24 HR FLOW PROP
	Frequency	5/WEEK	MONTHLY	MONTHLY	MONTHLY	MONTHLY
Sample Results	Day 1	0.3				
	2					
	3					
	4	0.2				
	5	0.3				
	6	0.3				
	7	0.5	<1.3	<2.5	4.9	<5.9
	8	0.9				
	9					
	10					
	11	0.4				
	12	0.1				
	13	0.2				
	14	0.3				
	15	0.4				
	16					
	17					
	18	0.5				
	19	0.3				
	20	0.7				
	21	0.3				
	22	0.4				
	23					
	24					
	25	0.5				
	26	0.3				
	27	0.5				
	28	0.3				
	29	0.3				
	30					
	31					

	Sample Point	001	001	001	001	001
	Description	Effluent	Effluent	Effluent	Effluent	Effluent
	Parameter	789	87	133	147	264
	Description	Nitrogen, Ammonia (NH3-N) Total	Cadmium, Total Recoverable	Chromium, Total Recoverable	Copper, Total Recoverable	Lead, Total Recoverable
	Units	mg/L	ug/L	ug/L	ug/L	ug/L
Summary Values	Monthly Avg	0.380952381	0	0	4.9	0
	Daily Max	0.9	<1.3	<2.5	4.9	<5.9
	Daily Max - Variable					
	Daily Min	0.1	<1.3	<2.5	4.9	<5.9
	Geometric Mean -					
	Geometric Mean -					
	Week 1 Avg	0.32				
	Week 2 Avg	0.38				
	Week 3 Avg	0.44				
	Week 4 Avg	0.4				
Limit(s) in Effect	Monthly Avg	4.40	0			
	Daily Max	17	0			
	Daily Max - Variable					
	Daily Min					
	Geometric Mean -					
	Geometric Mean -					
	Weekly Avg	11	0			
QA/QC Information	LOD	0.027	1.3	2.5	3.4	5.9
	LOQ	0.09	5	10	10	20
	QC Exceedance	N	N	N	N	N
	Lab Certification	445005220	405132750	405132750	405132750	405132750

	Sample Point	001	001	001	101	601
	Description	Effluent	Effluent	Effluent	Effluent Reuse	River Monitoring
	Parameter	315	553	391	671	400
	Description	Nickel, Total Recoverable	Zinc, Total Recoverable	E. coli	Flow Unregulated	WLA Previous Day River Flow
	Units	ug/L	ug/L	#/100ml	MGD	cfs
	Sample Type	24 HR FLOW PROP	24 HR FLOW PROP	GRAB	CONTINUOUS	GAUGE STN
	Frequency	MONTHLY	MONTHLY	WEEKLY	DAILY	DAILY
Sample Results	Day 1				3.318	2750
	2				3.427	2790
	3				3.491	2740
	4				3.057	2620
	5				3.056	2640
	6			150	3.187	2630
	7	7.6	17.8		3.386	2620
	8				3.373	2650
	9				3.387	3400
	10				3.467	3360
	11				3.052	3500
	12			105	2.886	4120
	13				3.287	4330
	14				3.621	4750
	15				3.197	5070
	16				3.395	5280
	17				3.161	4310
	18				3.400	5240
	19			45	3.338	4670
	20				3.067	5850
	21				3.102	5700
	22				3.095	5560
	23				1.589	5850
	24				0.865	5890
	25				0	5390
	26			65	0	4310
	27				0	2980
	28				0	3010
	29				0	3080
	30				0	3060
	31					

	Sample Point	001	001	001	101	601
	Description	Effluent	Effluent	Effluent	Effluent Reuse	River Monitoring
	Parameter	315	553	391	671	400
	Description	Nickel, Total Recoverable	Zinc, Total Recoverable	E. coli	Flow Unregulated	WLA Previous Day River Flow
	Units	ug/L	ug/L	#/100ml	MGD	cfs
Summary Values	Monthly Avg	7.6	17.8	91.25	2.473466667	4005
	Daily Max	7.6	17.8	150	3.621	5890
	Daily Max - Variable					
	Daily Min	7.6	17.8	45	0	2620
	Geometric Mean -					
	Geometric Mean -					
	Week 1 Avg					
	Week 2 Avg					
	Week 3 Avg					
	Week 4 Avg					
Limit(s) in Effect	Monthly Avg					
	Daily Max					
	Daily Max - Variable					
	Daily Min					
	Geometric Mean -					
	Geometric Mean -					
	Weekly Avg					
QA/QC Information	LOD	2.6	11.6			
	LOQ	10	40			
	QC Exceedance	N	N	N	N	N
	Lab Certification	405132750	405132750			

	Sample Point	601	601	006	006	006
	Description	River Monitoring	River Monitoring	WLA BOD5 Discharge Compliance	WLA BOD5 Discharge Compliance	WLA BOD5 Discharge Compliance
	Parameter	399	401	544	12	843
	Description	WLA Previous 4 Day Avg River Flow	WLA Previous Day River Temp	WLA BOD5 Value	WLA Adjusted Value	WLA BOD5 Discharged
	Units	cfs	degF	lbs/day	lbs/day	lbs/day
	Sample Type	CALCULATED	CALCULATED	SEE TABLE	CALCULATED	CALCULATED
	Frequency	DAILY	DAILY	DAILY	DAILY	DAILY
Sample Results	Day 1	2960	74	1956	2699	194
	2	2833	74	1956	2699	181
	3	2738	74	1819	2510	84
	4	2748	74	1819	2510	92
	5	2725	72	1676	2313	184
	6	2698	71	1994	2752	153
	7	2658	72	1994	2752	154
	8	2628	73	1994	2752	175
	9	2635	74	1819	2510	212
	10	2825	74	1956	2699	153
	11	3008	73	2160	2981	793
	12	3228	70	2456	3389	741
	13	3595	67	3053	4213	398
	14	3828	68	3053	4213	273
	15	4175	68	3526	4866	328
	16	4568	69	3526	4866	319
	17	4858	70	3137	4329	318
	18	4853	71	3137	4329	321
	19	4975	71	3137	4329	316
	20	4875	71	3137	4329	436
	21	5018	71	4434	6119	419
	22	5365	70	4434	6119	343
	23	5445	68	5208	7187	530
	24	5740	67	5208	7187	477
	25	5750	65	5568	7684	626
	26	5673	64	5568	7684	527
	27	5360	63	5568	7684	625
	28	4643	61	5001	6901	355
	29	3923	59	4079	5629	451
	30	3345	59	3529	4870	513
	31					

	Sample Point	601	601	006	006	006
	Description	River Monitoring	River Monitoring	WLA BOD5 Discharge Compliance	WLA BOD5 Discharge Compliance	WLA BOD5 Discharge Compliance
	Parameter	399	401	544	12	843
	Description	WLA Previous 4 Day Avg River Flow	WLA Previous Day River Temp	WLA BOD5 Value	WLA Adjusted Value	WLA BOD5 Discharged
	Units	cfs	degF	lbs/day	lbs/day	lbs/day
Summary Values	Monthly Avg	3989.1	69.233333333	3263.4	4503.466666667	356.366666667
	Daily Max	5750	74	5568	7684	793
	Daily Max - Variable					793
	Daily Min	2628	59	1676	2313	84
	Geometric Mean -					
	Geometric Mean -					
	Week 1 Avg					
	Week 2 Avg					
	Week 3 Avg					
	Week 4 Avg					
Limit(s) in Effect	Monthly Avg					
	Daily Max					
	Daily Max - Variable					0 0
	Daily Min					
	Geometric Mean -					
	Geometric Mean -					
	Weekly Avg					
QA/QC Information	LOD					
	LOQ					
	QC Exceedance	N	N	N	N	N
	Lab Certification					

	Sample Point	006	006	112
	Description	WLA BOD5 Discharge Compliance	WLA BOD5 Discharge Compliance	In-Plant Diversion
	Parameter	543	541	211
	Description	WLA 7 Day Sum Of WLA Values	WLA 7 Day Sum Of BOD5 Discharged	Flow Rate
	Units	lbs/day	lbs/day	MGD
	Sample Type	CALCULATED	CALCULATED	CONTINUOUS
	Frequency	DAILY	DAILY	DAILY
Sample Results	Day 1	15984	1371	0
	2	15602	1360	0
	3	15083	1260	0
	4	14564	1098	0
	5	13902	1052	0
	6	13558	1040	0
	7	1.214	1044	0
	8	13252	1025	0
	9	13115	1055	0
	10	13252	1123	0
	11	13593	1824	0
	12	14373	2381	0
	13	15432	2626	0
	14	16491	2744	0
	15	18023	2897	0
	16	19730	3005	0
	17	20911	3170	0
	18	21888	2698	0
	19	22569	2274	0
	20	22653	2312	0
	21	24034	2458	0
	22	24942	2474	0
	23	26624	2684	0
	24	28695	2843	0
	25	31126	3148	0
	26	33557	3358	0
	27	35988	3548	0
	28	36555	3484	0
	29	36200	3591	0
	30	34521	3575	0
	31			

	Sample Point	006	006	112
	Description	WLA BOD5 Discharge Compliance	WLA BOD5 Discharge Compliance	In-Plant Diversion
	Parameter	543	541	211
	Description	WLA 7 Day Sum Of WLA Values	WLA 7 Day Sum Of BOD5 Discharged	Flow Rate
	Units	lbs/day	lbs/day	MGD
Summary Values	Monthly Avg	20873.9404666667	2284.0666666667	0
	Daily Max	36555	3591	0
	Daily Max - Variable		3591	
	Daily Min	1.214	1025	0
	Geometric Mean -			
	Geometric Mean -			
	Week 1 Avg			
	Week 2 Avg			
	Week 3 Avg			
	Week 4 Avg			
Limit(s) in Effect	Monthly Avg			
	Daily Max			
	Daily Max - Variable		0	0
	Daily Min			
	Geometric Mean -			
	Geometric Mean -			
	Weekly Avg			
QA/QC Information	LOD			
	LOQ			
	QC Exceedance	N	N	N
	Lab Certification			

Footnotes (DNR Use Only; Instructions for completing this form that are unique for your facility may be displayed here.)

General Remarks

I certify that management practices identified in the approved water quality trading plan as the source of pollutant reduction credits are installed, established and properly maintained.

Laboratory Quality Control Comments

Influent Sampler on 9-6-22 was room temp.
9-8 BOD Blank of 0.33
9-9 BOD Blank of 0.46

Submitted by K3vin1 on 10/21/2022 8:08:57 AM