## Milwaukee Metro Sew Dist Combined

Last Updated: Reporting For: 5/7/2021 2020

#### **Influent Flow and Loading**

**Total Number of Points** 

Influent No. Influent Monthly 702 Average Flow, MGD		x	Influent Mor Average Bo Concentration	) DC		x	8.34	=	Influent Monthly Average BOD Loading, lbs/day	
January	1	L4.7097	x 222 x 8.34 =		212,012					
February	10	)2.4828	х	239			х	8.34	=	203,951
March	1	L4.9677	х	224			х	8.34	=	214,345
April	9	9.2000	х	262			х	8.34	=	216,484
Мау	14	46.6452	х	180			х	8.34	=	220,578
June	9	0.9000	х	272			х	8.34	=	206,205
July	9	0.0645	х	358			х	8.34	=	269,198
August	8	2.7742	х	381			х	8.34	=	262,996
September	7	9.4333	х	348			х	8.34	=	230,762
October	7	6.0968	x	372			x	8.34	=	236,048
November	6	3.8667	x	400			x	8.34	=	212,882
December	7	1.7097	x	368			x	8.34	=	220,317
lax Month De	esign Flo	w, MGD		esign Factor 170	x x x		90 10		=	% of Design 153 170
Max Month De Design BOD, I	lbs/day			170 291000	x x x x	90%	10 90 10	0 ) 0	= =	153 170 261900 291000
Design BOD, 2.2 Verify the and score:	lbs/day	of times the Number of tir flow was grea	flow nes ater	170 291000	x x x ded	Num BOD	10 90 10 or ber wa	0 ) 0	= = of de	153 170 261900
Design BOD, I 2.2 Verify the and score: January	lbs/day number Months of Influent	of times the Number of tir flow was grea than 90% o 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0	x x x ded	Num BOD	10 9( 10 or ber wa	0 0 100% c of time s greate o of des 0	= = of de	153 170 261900 291000 esign, points earned, Number of times BOD was greater than 100% of design 0
Design BOD, I 2.2 Verify the and score: January February	lbs/day number Months of Influent 1	of times the Number of tir flow was grea than 90% o 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0	x x x ded	Num BOD	10 90 10 or ber wa	0 0 100% c of time s greate o of des 0 0	= = of de	153 170 261900 291000 esign, points earned, Number of times BOD was greater than 100% of design 0 0
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Design BOD, I 2.2 Verify the and score: January January February March April	lbs/day number Months of Influent 1 1 1 1	Number of tim flow was greated than 90% of 0 0 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0 0 0	x x x ded	Num BOD	10 90 10 or ber wa	0 0 100% c of time s greate o of des 0 0 0 0	= = of de	153 170 261900 291000 esign, points earned, sign, points earned, bod was greater than 100% of design 0 0 0 0
Design BOD, I 2.2 Verify the and score: January February March	lbs/day number Months of Influent 1 1	of times the Number of tim flow was great than 90% of 0 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0 0	x x x ded	Num BOD	10 90 10 or ber wa	0 0 100% c of time s greate o of des 0 0 0	= = of de	153 170 261900 291000 esign, points earned, sign, points earned, BOD was greater than 100% of design 0 0 0
Design BOD, I 2.2 Verify the and score: January February March April May	bs/day number Months of Influent 1 1 1 1 1	of times the Number of tir flow was grea than 90% o 0 0 0 0 0 0 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0 0 0 0	x x x ded	Num BOD	10 90 10 or ber wa 90%	0 0 100% c of time s greate o of des 0 0 0 0 0	= = of de es	153 170 261900 291000 esign, points earned, solution of times BOD was greater than 100% of design 0 0 0 0 0 0 0
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2.2 Verify the and score: January February March April May June July August September October	bs/day number Months of Influent 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	of times the Number of tim flow was great than 90% of 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0 0 0 0 0 0 0 0 0 0 0 0	x x x ded	Num BOD	10 90 10 or ber wa 90%	0 0 100% c 100% c c of time s greate o of des 0 0 0 0 0 0 0 1 1 1 0 0	= = of de es	153 170 261900 291000 esign, points earned, Number of times BOD was greater than 100% of design 0 0 0 0 0 0 0 0 0 0 0 0 0
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Design BOD, I 2.2 Verify the and score: January February March April May June July August September October November December	bs/day number Months of Influent 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	r of times the Number of tim flow was great than 90% of 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0 0 0 0 0 0 0 0 0 0 0 0	x x x ded	Num BOD	10 90 10 0r ber wa 90%	0 0 100% c 0 f time s greate o of des 0 0 0 0 0 0 1 1 0 0 0 0 0 0 0 0 0 0 0	= = of de es	153 170 261900 291000 esign, points earned, Number of times BOD was greater than 100% of design 0 0 0 0 0 0 0 0 0 0 0 0 0
Design BOD, I 2.2 Verify the and score: January February March April May June July August September October November December Points per ea	lbs/day e number Months of Influent 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	r of times the Number of tim flow was greated than 90% of 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0 0 0 0 0 0 0 0 0 0 0 0	x x x ded	Num BOD	10 90 10 or ber wa 00%	0 0 100% c 100% c c of time s greate o of des 0 0 0 0 0 0 1 1 1 0 0 0 0 3	= = of de es	153 170 261900 291000 esign, points earned, Number of times BOD was greater than 100% of design 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0
Design BOD, I 2.2 Verify the and score: January February March April May June July August September October November December	lbs/day e number Months of Influent 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	r of times the Number of tim flow was great than 90% of 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	flow nes ater	170 291000 and BOD excee Number of time flow was greate than 100% of 0 0 0 0 0 0 0 0 0 0 0 0 0	x x x ded	Num BOD	10 90 10 07 ber wa 00%	0 0 100% c 0 f time s greate o of des 0 0 0 0 0 0 1 1 0 0 0 0 0 0 0 0 0 0 0	= = of de es	153 170 261900 291000 esign, points earned, Number of times BOD was greater than 100% of design 0 0 0 0 0 0 0 0 0 0 0 0 0

6

SOUTH SHORE

Milwaukee Metro Sew	Dist Combined		Last Updated: 5/7/2021	Reporting For <b>2020</b>
	nter last calibration 020-04-25	d in the last year? date (MM/DD/YYYY)		
	ity have a sewer use I pollutants ((C)BOE I users, hauled wast	e ordinance that limited or prohib ), SS, or pH) or toxic substances e, or residences?		
	n: occurred. The Distric e semi-annual and a	ance? t responds to violations accordin nnual Pretreatment Program rep		
5. Septage Receiving 5.1 Did you have requ Septic Tanks	lests to receive sept Holding Tanks			
o Yes	o Yes	o Yes		
● No	• No	• No		
<ul> <li>5.2 Did you receive se Septic Tanks</li> <li>Yes</li> <li>No</li> <li>Holding Tanks</li> <li>Yes</li> </ul>	ptage at your faclity	/? If yes, indicate volume in gallo ] gallons ] gallons	ons.	
<ul> <li>No</li> <li>Grease Traps</li> <li>Yes</li> <li>No</li> </ul>	the above, please e	gallons gallons explain if plant performance is af	fected when rece	eiving
or hazardous situation commercial or industri o Yes • No	is in the sewer syste ial discharges in the	al problems, permit violations, bi em or treatment plant that were last year? ommunity's response.		oncerns,

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• No

If yes, describe the types of wastes received and any procedures or other restrictions that were in place to protect the facility from the discharge of hauled industrial wastes.

Total Points Generated	6
Score (100 - Total Points Generated)	94
Section Grade	A

#### Milwaukee Metro Sew Dist Combined

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## Effluent Quality and Plant Performance (BOD/CBOD)

1. Effluent (C)BOD Results
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1.1 Verify the following monthly average effluent values, exceedances, and points for BOD or CBOD

Outfall No.	Monthly	90% of	Effluent Monthly		Permit Limit	90% Permit				
001	Average	Permit Limit	Average (mg/L)	Discharge	Exceedance	Limit	1			
	Limit (mg/L)	> 10 (mg/L)		with a Limit		Exceedance				
January	30	27	13	1	0	0	1			
February	30	27	13	1	0	0	1			
March	30	27	14	1	0	0	1			
April										
May 30 27 11 1 0 0										
	June 30 27 13 1 0 0									
July	30	27	14	1	0	0				
August	30	27	12	1	0	0				
September	30	27	11	1	0	0				
October	30	27	13	1	0	0	0			
November	30	27	13	1	0	0				
December	30	27	15	1	0	0	1			
		* Eq	uals limit if limit is	<= 10	-		1			
Months of d	ischarge/yr			12						
Points per e	ach exceedanc	ce with 12 mor	nths of discharge		7	3				
Exceedance	S				0	0				
Points					0	0	1			
Total numl	ber of points				-	0	1			
NOTE: For	systems that d	discharge inter	mittently to state	waters, the po	oints per month	nly				
			sed upon a multipl							
			ample: For a wast	ewater facility	discharging or	nly 6 months				
	, the multiplications occur		on was taken to re	aain complian	ce?					
				igani compilari			1			
							<u> </u>			
2. Flow Meter				_						
<ul><li>2.1 Was the</li><li>● Yes</li></ul>			ed in the last year							
• res		-10-19	n date (MM/DD/Y) ]	(11)						
○ No	2020	10 19	]							
If No, pleas	se evolain:									
							1			
3. Treatmen 3.1 What pr		, were experie	nced over the last	year that thre	eatened treatm	ent?				
Evidence	of industrial di	scharges exist	ed (foam, DO dep	ressions, etc.)	that impacted	treatment.				
4. Other Mon	nitoring and Lir	nits					-			
4.1 At any t	ime in the pas	t year was the	re an exceedance		nit for any othe	er pollutants				
such as chlo o Yes	orides, pH, resi	idual chlorine,	fecal coliform, or	metals?						

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If Yes, please explain:

4.2 At any time in the past year was there a failure of an effluent acute or chronic whole effluent toxicity (WET) test?

o Yes

• No

If Yes, please explain:

4.3 If the biomonitoring (WET) test did not pass, were steps taken to identify and/or reduce source(s) of toxicity?

o Yes

o No

• N/A

Please explain unless not applicable:

Total Points Generated	0
Score (100 - Total Points Generated)	100
Section Grade	Α

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## Effluent Quality and Plant Performance (Total Suspended Solids)

Outfall No. 001	Monthly Average Limit (mg/L)	90% of Permit Limit >10 (mg/L)	Effluent Monthly Average (mg/L)	Months of Discharge with a Limit	Permit Limit Exceedance	90% Permit Limit Exceedance	
January	30	27	9	1	0	0	
February	30	27	8	1	0	0	
March	30	27	9	1	0	0	
April	30	27	7	1	0	0	
May	30	27	8	1	0	0	
June	30	27	8	1	0	0	
July	30	27	12	1	0	0	
August	30	1	0	0			
September	eptember 30 27 9 1					0	
October	30	27	11	1	0	0	
November	30	27	10	1	0	0	
December	30	27	10	1	0	0	
		* Eq	uals limit if limit is	<= 10			
Months of D	ischarge/yr			12			
Points per	each exceed	ance with 12	months of disch	arge:	7	3	
Exceedance	S				0	0	
Points 0 0							
Total Number of Points 0							
exceedance the numbe	e for this section r of months of	on shall be bas discharge.	mittently to state sed upon a multipl charging only 6 mo	ication factor o	of 12 months d	livided by	

Total Points Generated	0
Score (100 - Total Points Generated)	100
Section Grade	Α

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## Effluent Quality and Plant Performance (Ammonia - NH3)

1. Effluent Ammonia Results

1.1 Verify the following monthly and weekly average effluent values, exceedances and points for ammonia

Outfall No.	Monthly	Weekly	Effluent	Monthly	Effluent	Effluent	Effluent	Effluent	Weekly
001	Average NH3	Average NH3	Monthly Average	Permit Limit	Weekly Average	Weekly Average	Weekly Average	Weekly	Permit Limit
	Limit	Limit	NH3	Exceed				Average for Week	Exceed
	(mg/L)	(mg/L)	(mg/L)	ance	1	2	3	4	ance
January	27		.3631612	9 0					
February	27		.6503103	45 0					
March	27		.8262580	65 0					
April	27		.5947666	67 0					
May									
June									
July									
August									
September									
October									
November	27		2.024233	833 0					
December	27		.5471612	90					
Points per e	ach excee	dance of N	Monthly av	/erage:					10
Exceedance	s, Monthly	/:							0
Points:									0
Points per each exceedance of weekly average (when there is no monthly average):							e):	2.5	
Exceedances, Weekly:								0	
Points:									0
Total Number of Points							0		
NOTE: Lim monthly av will be true limit does 1.2 If any v	verage lim e even if a not exist, t	it exists it weekly lir the weekly	will be us nit also ex / limit will	ed to dete ists. Whe be used t	ermine exc n a weekly o determin	eedances v average ne exceeda	and gener limit exister ances and	rate points s and a mo	. This onthly

Total Points Generated	0
Score (100 - Total Points Generated)	100
Section Grade	A

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## **Effluent Quality and Plant Performance (Phosphorus)**

1. Effluent Phosphorus Results	
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1.1 Verify the following monthly average effluent values, exceedances, and points for Phosphorus

Outfall No. 001	Monthly Average phosphorus Limit (mg/L)	Effluent Monthly Average phosphorus (mg/L)	Months of Discharge with a Limit	Permit Limit Exceedance
January	1	0.262	1	0
February	1	0.314	1	0
March	1	0.569	1	0
April	1	0.259	1	0
Мау	1	0.243	1	0
June	1	0.528	1	0
July	1	0.509	1	0
August	1	0.588	1	0
September	1	0.721	1	0
October	1	0.643	1	0
November	1	0.542	1	0
December	1	0.462	1	0
Months of Discharg	ge/yr		12	
Points per each	exceedance with 1	2 months of dischar	ge:	10
Exceedances				0
Total Number of	Points			0
exceedance for th the number of mo	is section shall be band the band be band be band by band band band band band band band band	rmittently to waters o sed upon a multiplicat charging only 6 month	ion factor of 12 mor s of the year, the m	nths divided by

1.2 If any violations occurred, what action was taken to regain compliance?

Total Points Generated	0
Score (100 - Total Points Generated)	100
Section Grade	A

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## **Biosolids Quality and Management**

1. Biosolid																			
1.1 How of Land a ∠ Land a Public! Hauleo Landfi Incine Other NOTE: If as lagoon 1.1.1 If y	lid yo applie ly Dis d to a lled rated you o ns, re you ch	u use d unc tribut nothe did no ed be necke	e or dis ler you ed Exe er perr ot rem eds, re d Othe	ove l ceptionitte	rmit onal ( d faci bioso lating ease	Quali ility lids f g san desc	rom d filt	osoli your ers,	ds syste etc.	em, I	pleas	e des	scribe	-	-				
Biosoli biosoli applica 2020.	ds fro tion f	m Jor From (	nes Isl Outfall	and 004	WRF, in 20	heat 020.	t drie 755	ed, ar dry t	nd pu ons c	blicly	y dist <e fro<="" td=""><td>ribut m O</td><td>ed as utfall</td><td>s EQ</td><td>bioso</td><td>olids. I</td><td>No lan</td><td>d</td><td></td></e>	ribut m O	ed as utfall	s EQ	bioso	olids. I	No lan	d	
2. Land Ap 2.1 Last Y 2.1.1 Ho 25578.8 2.1.2 Ho 160.4 2.2 If you	'ear's w ma 30 acr w ma	Appr ny ac res ny ac	oved a res di- res di- acro	d you d you es	ı hav ı use	e? ?					ion n	eeds,	. wha	at act	ion v	vas ta	ken?		
2.3 Did yo o Yes (30 • No 2.4 Have years? • Yes o No (10 o N/A	) poir all the	nts) e site		-								-						ar?	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolide</li> <li>Number of 3.1 For eacher years?</li> <li>Outfall No</li> <li>Parameter</li> </ul>	D poir all the point s Meta f bios ach ou year.	nts) e site ts) als solids utfall - Sou H.Q. Limit	s you outfal tested uth Sh Ceiling Limit	used Is in , ver ore (	last your ify th	year WPD we bic	for la PES p psolic	and a	applic t: etal q	catior	n bee	n soi	l tesi	bur fa	the	previo durin	g the	last Ceiling	0
<ul> <li>Yes (30</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10</li> <li>N/A</li> <li>3. Biosolide</li> <li>Number of</li> <li>3.1 For eaclendary</li> <li>Outfall No</li> </ul>	) poin all the point s Meta f bios ach ou /ear. . 005 80% of	e site ts) als solids utfall - Sou H.Q.	s you outfal tested uth Sh Ceiling	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	y val	n soi ues f	l test	bur fa	cility	previo durin	g the	last Ceiling	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolide</li> <li>Number of</li> <li>3.1 For eacher year</li> <li>Outfall No</li> <li>Parameter</li> </ul>	) poin all the point s Meta f bios ach ou /ear. . 005 80% of	nts) e site ts) als solids utfall - Sou H.Q. Limit	s you outfal tested uth Sh Ceiling Limit	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	y val	n soi ues f	l test	bur fa	cility	previo durin	g the	last Ceiling	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolide</li> <li>Number of</li> <li>3.1 For eaclendar year</li> <li>Outfall No</li> <li>Parameter</li> <li>Arsenic</li> <li>Cadmium</li> </ul>	) poin all the point s Meta f bios ach ou /ear. . 005 80% of	nts) e site ts) als olids utfall - Sou H.Q. Limit 41	s you outfal tested Limit 75 85	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	y val	n soi ues f	l test	bur fa	cility	previo durin	g the High Quality	last Ceiling 0	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolida</li> <li>Number of 3.1 For eacher years</li> <li>Outfall No</li> <li>Parameter</li> <li>Arsenic</li> <li>Cadmium</li> <li>Copper</li> </ul>	) poin all the point s Meta f bios ach ou /ear. . 005 80% of	nts) e site ts) als colids utfall - Sou H.Q. Limit 41 39 1500	s you outfal tested Limit 75 85 4300	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	y val Aug 0 1.65 445	n soi ues f	l test	bur fa	cility	previo durin	g the Quality 0 0	last Ceiling 0 0	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolide</li> <li>Number of 3.1 For eacher years</li> <li>Outfall No</li> <li>Parameter</li> <li>Arsenic</li> <li>Cadmium</li> <li>Copper</li> <li>Lead</li> </ul>	) poin all the point s Meta f bios ach ou /ear. . 005 80% of	e site ts) als colids utfall - Sou H.Q. Limit 41 39 1500 300	s you outfal tested Limit 75 85 4300 840	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	y val Aug 0 1.65 445 54.5	n soi ues f	l test	bur fa	cility	previo durin	g the High Quality 0 0 0	Ceiling 0 0 0	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolids</li> <li>Number of 3.1 For each calendar years</li> <li>Outfall No</li> <li>Parameter</li> <li>Arsenic</li> <li>Cadmium</li> <li>Copper</li> <li>Lead</li> <li>Mercury</li> </ul>	D point all the point s Meta f bios ach ou /ear. . 005 80% of Limit	nts) e site ts) als colids utfall - Sou H.Q. Limit 41 39 1500	s you outfal tested th Sh Ceiling Limit 75 85 4300 840 57	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	Aug 0 1.65 445 54.5 .415	n soi ues f	l test	bur fa	cility	durin	g the Quality 0 0	Ceiling 0 0 0 0 0	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolide</li> <li>Number of</li> <li>3.1 For eacher</li> <li>Outfall No</li> <li>Parameter</li> <li>Arsenic</li> <li>Cadmium</li> <li>Copper</li> <li>Lead</li> <li>Mercury</li> <li>Molybdenum</li> </ul>	D poin all the point s Meta f bios ach ou /ear. . 005 80% of Limit	e site ts) als colids utfall - Sou H.Q. Limit 41 39 1500 300	s you outfal tested Limit 75 85 4300 840 57 75	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	Aug 0 1.65 445 54.5 .415 16	n soi ues f	l test	bur fa	cility	durin 80% Value	g the High Quality 0 0 0	Ceiling 0 0 0 0 0 0	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolide</li> <li>Rumber of 3.1 For each calendar years</li> <li>Outfall No</li> <li>Parameter</li> <li>Arsenic</li> <li>Cadmium</li> <li>Copper</li> <li>Lead</li> </ul>	D point all the point s Meta f bios ach ou /ear. . 005 80% of Limit	e site ts) als colids utfall - Sou H.Q. Limit 41 39 1500 300	s you outfal tested th Sh Ceiling Limit 75 85 4300 840 57	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	Aug 0 1.65 445 54.5 .415	n soi ues f	l test	bur fa	cility	durin	g the High Quality 0 0 0	Ceiling 0 0 0 0 0	0
<ul> <li>Yes (30)</li> <li>No</li> <li>2.4 Have years?</li> <li>Yes</li> <li>No (10)</li> <li>N/A</li> <li>Biosolide</li> <li>Number of</li> <li>3.1 For eacher</li> <li>Outfall No</li> <li>Parameter</li> <li>Arsenic</li> <li>Cadmium</li> <li>Copper</li> <li>Lead</li> <li>Mercury</li> <li>Molybdenum</li> </ul>	D poin all the point s Meta f bios ach ou /ear. . 005 80% of Limit	e site ts) als colids utfall - Sou H.Q. Limit 41 39 1500 300	s you outfal tested Limit 75 85 4300 840 57 75	used Is in , ver ore (	last your ify th	year WPD be bic Slude	for la PES p psolic	ermi Is me	applic t: etal q	ualit	Aug 0 1.65 445 54.5 .415 16	n soi ues f	l test	bur fa	cility	durin 80% Value	g the High Quality 0 0 0	Ceiling 0 0 0 0 0 0	0

ilwaukee Metro Sew Dist Combin	ed	Last Updated: 5/7/2021	Reporting <b>2020</b>	
<pre>molybdenum, nickel, or selenium = Exceedence Points 0 (0 Points) 0 1-2 (10 Points) 0 &gt; 2 (15 Points) 3.1.2 If you exceeded the high quate each land application site? (check at 0 Yes 0 No (10 points)</pre>	lity limits, did you cumulatively track the policable box)			
Exceedence Points • 0 (0 Points) • 1 (10 Points) • > 1 (15 Points) 3.1.4 Were biosolids land applied w • Yes (20 Points) • No (0 Points)	s until limit was met (0 points) netals exceeded the ceiling limits = 0 which exceeded the ceiling limit? y or ceiling) was exceeded at any time,	what action wa	s taken?	o
<ul> <li>Pathogen Control (per outfall):</li> <li>4.1 Verify the following information.</li> <li>under the Options header in the left</li> </ul>	If any information is incorrect, use the -side menu.	Report Issue b	utton	
Outfall Number:	005			
Biosolids Class:	В			
Bacteria Type and Limit:	Fecal Coliform			
Sample Dates:	11/01/2020 - 12/31/2020			
Density:	4,600			
Sample Concentration Amount:	CFU/G TS			
Requirement Met:	Yes			
Land Applied:	Yes			
Process:	Aerobic Digestion			
Process Description:	The geometric mean 1370 MPN/gT	S of 7 discrote		

#### **Milwaukee Metro Sew Dist Combined**

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0

	5/7/2021	2020
Outfall Number:	005	
Biosolids Class:	В	1
Bacteria Type and Limit:	Fecal Coliform	1
Sample Dates:	11/01/2020 - 12/31/2020	1
Density:	4,500	1
Sample Concentration Amount:	CFU/G TS	1
Requirement Met:	Yes	
Land Applied:	Yes	1 1
Process:	Anaerobic Digestion	1  _
Process Description:	The geometric mean 652 MPN/gTS, of 7 discrete samples is less than 2,000,000 MPN/gTS.	<b>0</b>

4.2 If exceeded Class B limit or did not meet the process criteria at the time of land application. 4.2.1 Was the limit exceeded or the process criteria not met at the time of land application? • Yes (40 Points)

No

If yes, what action was taken?

#### 5. Vector Attraction Reduction (per outfall):

5.1 Verify the following information. If any of the information is incorrect, use the Report Issue button under the Options header in the left-side menu.

Outfall Number:	005
Method Date:	08/10/2020
Option Used To Satisfy Requirement:	Volatile Solids Reduction
Requirement Met:	Yes
Land Applied:	Yes
Limit (if applicable):	>=38
Results (if applicable):	62.50

Outfall Number:	005
Method Date:	08/10/2020
Option Used To Satisfy Requirement:	Volatile Solids Reduction
Requirement Met:	Yes
Land Applied:	Yes
Limit (if applicable):	>=38
Results (if applicable):	57

5.2 Was the limit exceeded or the process criteria not met at the time of land application? • Yes (40 Points)

• No

If yes, what action was taken?

#### 6. Biosolids Storage

6.1 How many days of actual, current biosolids storage capacity did your wastewater treatment facility have either on-site or off-site?

• >= 180 days (0 Points)

150 - 179 days (10 Points)

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<ul> <li>0 120 - 149 days (20 Points)</li> <li>0 90 - 119 days (30 Points)</li> <li>0 &lt; 90 days (40 Points)</li> <li>0 N/A (0 Points)</li> <li>6.2 If you checked N/A above, explain why.</li> </ul>		0
<ul> <li>7. Issues</li> <li>7.1 Describe any outstanding biosolids issues with treatment, use or overa</li> </ul>	ll management:	

Total Points Generated	0
Score (100 - Total Points Generated)	100
Section Grade	A

## Milwaukee Metro Sew Dist Combined

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# Staffing and Preventative Maintenance (All Treatment Plants)

<ol> <li>Plant Staffing</li> <li>1.1 Was your wastewater treatment plant adequately staffed last year?</li> <li>Yes</li> <li>No</li> <li>If No, please explain:</li> </ol>	
Could use more help/staff for:	
<ul> <li>1.2 Did your wastewater staff have adequate time to properly operate and maintain the plant and fulfill all wastewater management tasks including recordkeeping?</li> <li>Yes</li> <li>No</li> </ul>	
If No, please explain:	
<ul> <li>2. Preventative Maintenance</li> <li>2.1 Did your plant have a documented AND implemented plan for preventative maintenance on major equipment items?</li> <li>Yes (Continue with question 2) □□</li> <li>No (40 points)□□</li> </ul>	
If No, please explain, then go to question 3:	
<ul> <li>2.2 Did this preventative maintenance program depict frequency of intervals, types of lubrication, and other tasks necessary for each piece of equipment?</li> <li>Yes</li> <li>No (10 points)</li> </ul>	0
<ul><li>2.3 Were these preventative maintenance tasks, as well as major equipment repairs, recorded and filed so future maintenance problems can be assessed properly?</li><li>Yes</li></ul>	
<ul> <li>Paper file system</li> <li>Computer system</li> <li>Both paper and computer system</li> <li>No (10 points)</li> </ul>	
<ul> <li>3. O&amp;M Manual</li> <li>3.1 Does your plant have a detailed O&amp;M and Manufacturer Equipment Manuals that can be used as a reference when needed?</li> <li>Yes</li> <li>No</li> </ul>	
<ul> <li>4. Overall Maintenance /Repairs</li> <li>4.1 Rate the overall maintenance of your wastewater plant.</li> <li>Excellent</li> <li>Very good</li> <li>Good</li> <li>Good</li> <li>Fair</li> <li>Poor</li> <li>Describe your rating:</li> </ul>	
Maintenance work is addressed on a priority system in a timely manner.	1

# Compliance Maintenance Annual Report Milwaukee Metro Sew Dist Combined

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Total Points Generated	0
Score (100 - Total Points Generated)	100
Section Grade	A

## Milwaukee Metro Sew Dist Combined

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## **Operator Certification and Education**

1.1 Did yc ● Yes (0 ○ No (20 Name:	points) RETT P KELLY	n-charge during the	report year?			0
2.1 In acc and subcl treatment	tion Requirements cordance with Chapter NR 114.50 ass(es) were required for the op c plant and what level and subcla	erator-in-charge (O ass(es) were held by	IC) to operat	te the waste pr-in-charge?	water	
Sub Class	SubClass Description	WWTP	0.77	OIC		
		Advanced	OIT	Basic	Advanced	
A1	Suspended Growth Processes	Х			X	
A2	Attached Growth Processes					
A3	Recirculating Media Filters					
A4	Ponds, Lagoons and Natural		Х			
A5	Anaerobic Treatment Of Liquid					
В	Solids Separation	Х			X	
С	Biological Solids/Sludges	Х			X	0
Р	Total Phosphorus	Х			Х	
N	Total Nitrogen					
D	Disinfection	Х			Х	
L	Laboratory					
U	Unique Treatment Systems					
SS	Sanitary Sewage Collection	Х	NA	NA	NA	
<ul> <li>2.2 Was the operator-in-charge certified at the appropriate level and subclass(es) to operate this plant? (Note: Certification in subclass SS is required 5 years after permit reissuance and is basic level only.)</li> <li>Yes (0 points)</li> <li>No (20 points)</li> </ul>						
<ul> <li>3. Succession Planning</li> <li>3.1 In the event of the loss of your designated operator-in-charge, did you have a contingency plan to ensure the continued proper operation and maintenance of the plant that includes one or more of the following options (check all that apply)?</li> <li> M One or more additional certified operators on staff An arrangement with another certified operator An arrangement with another community with a certified operator An operator on staff who has an operator-in-training certificate for your plant and is expected to be certified within one year A consultant to serve as your certified operator None of the above (20 points) If "None of the above" is selected, please explain: </li> </ul>				0		

Milwaukee Metro Sew Dist Combined	Last Updated: 5/7/2021	Reporting Fo 2020	or:
<ul> <li>4.1 If you had a designated operator-in-charge, was the operator-in-cle Education Credits at the following rates?</li> <li>OIT and Basic Certification:</li> <li>Averaging 6 or more CECs per year.</li> <li>Averaging less than 6 CECs per year.</li> </ul>	harge earning Contin	uing	

Advanced Certification:

• Averaging 8 or more CECs per year.

• Averaging less than 8 CECs per year.

Total Points Generated	0
Score (100 - Total Points Generated)	100
Section Grade	A

Last Updated: Reporting For 5/7/2021 2020
(XXX) XXX-XXXX
nses for your wastewater st reviewed and/or revised? Replacement Fund, etc.) or our wastewater treatment
ETE QUESTION 3]
<pre>* revised?  \$ 15,442,080.00 \$ 0.00 \$ 15,442,080.00</pre>
F y <sup>i</sup>

3.2.4 Additions to Fund (e.g. portion of User Fee, earned interest, etc.)

+ \$

413,486.00

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3.2.5 Subtractions from Fund (e.g., equipment replacement, major repairs - use description box 3.2.6.1 below*)-\$	0	.00	
3.2.6 Ending Balance as of December 31st for CMAR Reporting Year	15,855,566	.00	
All Sources: This ending balance should include all Equipment Replacement Funds whether held in a bank account(s), certificate(s) of deposit, etc.			
3.2.6.1 Indicate adjustments, equipment purchases, and/or major repairs	from 3.2.5 a	above.	
3.3 What amount should be in your Replacement Fund? \$ 15,855,5	66.00	o	
<ul> <li>Please note: If you had a CWFP loan, this amount was originally based on the Financial Assistance Agreement (FAA) and should be regularly updated as needed. Further calculation instructions and an example can be found by clicking the SectionInstructions link under Info header in the left-side menu.</li> <li>3.3.1 Is the December 31 Ending Balance in your Replacement Fund above, (#3.2.6) equal to, or greater than the amount that should be in it (#3.3)?</li> <li>Yes</li> </ul>			
<ul> <li>No</li> <li>If No, please explain.</li> </ul>			
<ul> <li>4. Future Planning</li> <li>4.1 During the next ten years, will you be involved in formal planning for upgrading, rehabilitating, or new construction of your treatment facility or collection system?</li> <li>Yes - If Yes, please provide major project information, if not already listed below.□□</li> <li>No</li> </ul> Project Project Description Estimated Approximate			
#	Cost	Construction Year	
1 South Shore Water Reclamation Facility: 30 Projects	123,523,013	2026	
2       Conveyance Projects: See Jones Island CMAR, Financial Management, Item 4.1         3       Jones Island Water Reclamation Facility and Pipelines: See Jones Island CMAR, Financial Management, Item 4.1			
5. Financial Management General Comments			
Response #4 above represents planned spending for Conveyance (Collection System) and Water Reclamation Facility (Jones Island, Pipelines, and South Shore) projects for the District's 6-year planning cycle beginning in 2021. Jones Island and Pipeline project counts and costs have been combined. Additional projects, i.e. Watercourse Improvement and other projects, as well as debt service during the same 6-year period will total \$1.5 billion. For a complete listing of all projects and expenditures planned for the period 2021 to 2026, refer to the MMSD 2021 Capital Budget.			
ENERGY EFFICIENCY AND USE			
<ul><li>6. Collection System</li><li>6.1 Energy Usage</li><li>6.1.1 Enter the monthly energy usage from the different energy sources:</li></ul>			
COLLECTION SYSTEM PUMPAGE: Total Power Consumed			
Number of Municipally Owned Pump/Lift Stations: 19			

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	Electricity Consumed (kWh)	Natural Gas Consumed (therms)
January	614,950	40,477
February	507,185	22,644
March	474,534	50,211
April	453,182	20,131
May	443,725	7,246
June	480,247	16,076
July	652,207	4,681
August	432,253	5,123
September	411,266	6,909
October	350,687	15,032
November	212,265	20,414
December	440,164	4,824
Total	5,472,665	213,768
Average	456,055	17,814

#### 6.1.2 Comments:

6.2 Energy Related Processes and Equipment

6.2.1 Indicate equipment and practices utilized at your pump/lift stations (Check all that apply): ☑ Comminution or Screening

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- Extended Shaft Pumps
- $\boxtimes$  Flow Metering and Recording
- Pneumatic Pumping
- SCADA System
- Self-Priming Pumps
- Submersible Pumps
- ☑ Variable Speed Drives
- Other:

Gate control motors, heaters

#### 6.2.2 Comments:

6.3 Has an Energy Study been performed for your pump/lift stations?

o No

• Yes

Year:

2018

By Whom:

We Energies

Describe and Comment:

A level 1 energy assessment was done in 2018 for the Port Washington Pumping Station. The assessment delivered a report that outlined opportunities for reducing energy.

Milwaukee Metro Sew Dist Combined	Last Updated:	Reporting For:
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6.4 Future Energy Related Equipment

6.4.1 What energy efficient equipment or practices do you have planned for the future for your pump/lift stations?

In 2021 the District will evaluate the various sites for opportunities to improve our energy efficiency and renewable energy profile through Energy Plan in addition to evaluating energy efficiency during rehabilitation projects. Improved power monitor monitoring, controls, and the installation of energy efficient devices such as VFDs continue to be practiced by the District.

#### 7. Treatment Facility

7.1 Energy Usage

7.1.1 Enter the monthly energy usage from the different energy sources:

#### **TREATMENT PLANT: Total Power Consumed/Month**

	Electricity Consumed (kWh)	Total Influent Flow (MG)	Electricity Consumed/ Flow (kWh/MG)	Total Influent BOD (1000 lbs)	Electricity Consumed/ Total Influent BOD (kWh/1000lbs)	Natural Gas Consumed (therms)
January	3,822,149	3,556.00	1,075	6,572.37	582	71,585
February	3,447,480	2,972.00	1,160	5,914.58	583	78,018
March	3,578,623	3,564.00	1,004	6,644.70	539	74,866
April	3,425,481	2,976.00	1,151	6,494.52	527	85,896
Мау	3,525,414	4,546.00	775	6,837.92	516	84,344
June	3,441,879	2,727.00	1,262	6,186.15	556	63,387
July	3,684,221	2,792.00	1,320	8,345.14	441	56,448
August	4,030,206	2,566.00	1,571	8,152.88	494	63,234
September	3,806,126	2,383.00	1,597	6,922.86	550	61,183
October	3,799,235	2,359.00	1,611	7,317.49	519	20,025
November	3,616,143	1,916.00	1,887	6,386.46	566	46,492
December	3,742,463	2,223.00	1,684	6,829.83	548	66,565
Total	43,919,420	34,580.00		82,604.90		772,043
Average	3,659,952	2,881.67	1,341	6,883.74	535	64,337

1.2 Comments:

7.2 Energy Related Processes and Equipment

- 7.2.1 Indicate equipment and practices utilized at your treatment facility (Check all that apply):
- Anaerobic Digestion
- Biological Phosphorus Removal
- Coarse Bubble Diffusers
- ☑ Dissolved O2 Monitoring and Aeration Control
- Effluent Pumping
- I Fine Bubble Diffusers
- ☑ Influent Pumping
- Mechanical Sludge Processing
- ☑ Nitrification
- SCADA System

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□ UV Disinfection ⊠ Variable Speed Drives ⊠ Other:		
Gravity belt thickeners, plate and frame presses		
7.2.2 Comments:		
7.3 Future Energy Related Equipment		1
7.3.1 What energy efficient equipment or practices do you have planne treatment facility?	d for the future for	your
The 2035 Vision, adopted in 2010, has two elements: integrated water climate change adaptation with an emphasis on energy efficiency. The improvement projects with the Vision to meet a net of 100% of MMSD renewable energy sources and 80% produced with internal, renewable was finalized in January 2015 and is being implemented to attain the I embodied in the 2035 Vision available here: https://www.mmsd.com/a recommendations in the Energy Plan are all either in progress or were Facilities Plan that was finalized in 2020. The Energy Plan will be renew treatment plants, we recommend the following examples of energy eff South Shore Water Reclamation Facility: S01013 – Primary Clarifier Overhaul S02015 – Aeration Basin Diffuser Replacement S04034 – High Strength Waste Mixing Improvements S04035 – Digester 6 & 8 Mixer Replacement S04036 – Bldg 383 HVAC Replacement	District aligns cap 's energy needs wi sources. The Ener District's long-term about-us/2035-vis studied in the 205 wed in 2021. For th	ital rgy Plan goals ion. The io
8. Biogas Generation		
<ul> <li>8.1 Do you generate/produce biogas at your facility?</li> <li>No</li> <li>Yes</li> </ul>		
<ul> <li>Tes</li> <li>If Yes, how is the biogas used (Check all that apply):</li> <li>If Iared Off</li> </ul>		
<ul> <li>☑ Building Heat</li> <li>☑ Process Heat</li> <li>☑ Generate Electricity</li> <li>☑ Other:</li> </ul>		
9. Energy Efficiency Study		
<ul> <li>9.1 Has an Energy Study been performed for your treatment facility?</li> <li>No</li> <li>Yas</li> </ul>		
<ul> <li>Yes</li> <li>☑ Entire facility</li> <li>Year:</li> </ul>		
2017		

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By Whom: University of Wisconsin - Milwaukee Industrial Assessment Center
Describe and Comment:
Assessment covered equipment drives, lighting, and lubricant use throughout the entire facility.
Part of the facility
Year: 2015
By Whom:
Short Elliot Hendrickson and Poyry
Describe and Comment:
MACT assessment was completed of the boilers. Many other processes throughout the facility have been assessed and are monitored for efficiency internally.

Total Points Generated	
Score (100 - Total Points Generated)	100
Section Grade	Α

#### Milwaukee Metro Sew Dist Combined

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	pacity, Management, Operation, and Maintenance (CMOM) Program To you have a CMOM program that is being implemented?
• Ye	5
o No	
If N	o, explain:
	to you have a CMOM program that contains all the applicable components and items ding to Wisc. Adm Code NR 210.23 (4)?
• Ye	5
o No	(30 points)
0 N/	Α
If N	o or N/A, explain:
comp 🛛 G	Does your CMOM program contain the following components and items? (check the conents and items that apply) bals [NR 210.23 (4)(a)]
Des	cribe the major goals you had for your collection system last year:
CN 1. 2. sta 3. 4. 5. 6. 7. 8. 9. ma 10 for an 11 of 12 res	e MMSD CMOM goals related to the conveyance and storage system as presented in the IOM Program Annual Report for 2020 are: Continue the support of the CMOM Program within the District organizational structure. Communicate the goals and objectives of the CMOM Program to internal and external ikeholders, monitor the CMOM Program, and institute program modifications. Continue to maintain adequate financial planning. Continue to comply with regulatory requirements. Continue to support and monitor the regional CMOM program. Continue to maintain a safe work environment and facilities and also sustain a competent rkforce. Establish CMOM program elements specific to minimizing the number and volume of CSOs. Continue to implement and support the Wet Weather Peak Flow Management Program. Where possible, establish additional practices to prevent sanitary sewer overflows (SSOs), intain or improve system performance, and avoid preventable failures. Continue to establish and document level of protection, design, and performance standards new conveyance assets constructed in the District service area, and consider documented d predicted changes in climate. Minimize the cost of conveyance asset ownership while maintaining necessary stewardship assets and achieving defined protection levels. Enhance District level of knowledge and understanding of wet weather flows and system sponse to precipitation and other factors. Promptly and accurately respond to customer inquiries.
	you accomplish them?
	res
• `	
• ` 0	No, explain:

Does this chapter of your CMOM include:

☑ Organizational structure and positions (eg. organizational chart and position descriptions)

 $\boxtimes$  Internal and external lines of communication responsibilities

 $\boxtimes$  Person(s) responsible for reporting overflow events to the department and the public

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⊠ Legal Authority [NR 210.23 (4) (c)]			
What is the legally binding document that regulates the use of your sewe	er system?		
If you have a Sewer Use Ordinance or other similar document, when was revised? (MM/DD/YYYY) 2018-01-22	it last reviewed	and	
Does your sewer use ordinance or other legally binding document addres	s the following:		
New sewer and building sewer design, construction, installation, testi	ng and inspectio	n	
oxtimes Rehabilitated sewer and lift station installation, testing and inspection	1		
Sewage flows satellite system and large private users are monitored a necessary	and controlled, a	S	
☑ Fat, oil and grease control			
$\boxtimes$ Enforcement procedures for sewer use non-compliance			
Operation and Maintenance [NR 210.23 (4) (d)] Does your operation and maintenance program and equipment include the second se	e following:		
$\boxtimes$ Equipment and replacement part inventories	le following.		
Up-to-date sewer system map			
$\boxtimes$ A management system (computer database and/or file system) for co	llection system		
_ information for O&M activities, investigation and rehabilitation	·		
$\boxtimes$ A description of routine operation and maintenance activities (see que	estion 2 below)		
Capacity assessment program			
Basement back assessment and correction			
$\boxtimes$ Regular O&M training			
$\boxtimes$ Design and Performance Provisions [NR 210.23 (4) (e)] $\Box$	ion and increat	ion of	0
What standards and procedures are established for the design, construct the sewer collection system, including building sewers and interceptor se property?			
State Plumbing Code, DNR NR 110 Standards and/or local Municipal (	Code Reauireme	nts	
☑ Construction, Inspection, and Testing			
□ Others:			
L ☑ Overflow Emergency Response Plan [NR 210.23 (4) (f)]□□			
Does your emergency response capability include:			
Responsible personnel communication procedures			
Response order, timing and clean-up			
Public notification protocols			
🛛 Training			
oxtimes Emergency operation protocols and implementation procedures			
$oxtimes$ Annual Self-Auditing of your CMOM Program [NR 210.23 (5)] $\Box\Box$			
$\Box$ Special Studies Last Year (check only those that apply):			
Infiltration/Inflow (I/I) Analysis			
Sewer System Evaluation Survey (SSES)			
Sewer Evaluation and Capacity Managment Plan (SECAP)			
Lift Station Evaluation Report     Otherway			
Others:			
2. Operation and Maintenance			Γ
2.1 Did your sanitary sewer collection system maintenance program include	de the following		

maintenance activities? Complete all that apply and indicate the amount maintained.

Milwaukee Metro Sew Di	st Combined		Last Updated: 5/7/2021	Reporting For: 2020
Cleaning	0.33	3 % of system/year		
Root removal	0	% of system/year		
Flow monitoring	85	% of system/year		
Smoke testing	0	% of system/year		
Sewer line televising	4.36	% of system/year		
Manhole inspections	0	% of system/year		
Lift station O&M	19	# per L.S./year		
Manhole rehabilitation	0	% of manholes rehabbed		
Mainline rehabilitation	0	% of sewer lines rehabbe	ed	
Private sewer inspections	0.09	% of system/year		
Private sewer I/I removal	0.39	% of private services		
River or water crossings	0	% of pipe crossings evalu	uated or maintai	ned
Please include additiona	al comments about your	r sanitary sewer collection	system below:	
41.01 To 34.76 An 302 Mil 19 Nu 0 Nu	collection system and f tal actual amount of pre nual average precipitati les of sanitary sewer mber of lift stations mber of lift station failu	ires		
	mber of sewer pipe fail			
	mber of basement back	cup occurrences		
	mber of complaints	<i></i>		
	erage daily flow in MGD	. ,		
	ak monthly flow in MGD			
	ak hourly flow in MGD (	if available)		
3.2 Performance ratios fo	r the past year: t station failures (failure	es/year)		
0.00 Se	wer pipe failures (pipe f	failures/sewer mile/yr)		
0.00 Sa	nitary sewer overflows	(number/sewer mile/yr)		
0.00 Ba	sement backups (numb	er/sewer mile)		
0.00 Co	mplaints (number/sewe	er mile)		
1.6 Pe	aking factor ratio (Peak	Monthly: Annual Daily Avg	)	
3.1 Pe	aking factor ratio (Peak	Hourly:Annual Daily Avg)		

#### Milwaukee Metro Sew Dist Combined

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. Overflows					
LIST OF SANITARY S	EWER (SSO) AND TREATMENT FACILITY (TH Location	-O) OVERFLOWS R Cause	EPORTED ** Estimated Volume		
0 5/17/2020 5:30:00 PM - 5/17/2020 7:00:00 PM	South Howell Avenue, South of East Grange Avenue	Rain	0.03		
corrected.	TFOs that are not listed above, please contact the DNI re underway, to reduce or eliminate SSO or TFO occu		section until		
reclamation facilities in a ma overflows. The District's Wet to identify areas to target for overflows, the District has fu last ten years. In 2020 the P of the annual budget. The Di the North Broadmoor Road a the Roosevelt MIS at Roosev	<sup>r</sup> Milwaukee will continue to operate the conveyance sinner to prevent separate sewer overflows and to maxi Weather Peak Flow Management Program evaluates in improvements. To further reduce the risk of basemended \$31M of infiltration and inflow reduction projects rivate Property Inflow and Infiltration Reduction Prograstrict has started design on a project to reduce overflow no North River Road/W Green Tree Road sites. Design elt Drive and North 35th Street. The District also has a le to reduce or eliminate overflows at each SSO site.	imum the capture of con nfiltration and inflow in ant backups and separat throughout our service am was made a permar ows from the Mill Road for continues to address o	mbined sewer our service area te sewer area over the nent component Relief Sewer at overflows from		
contributor of peak fl	nflow (I/I) in satellite municipal collection s ows from the separate sewer area of the M	MSD conveyance s			
5.2 Has infiltration/inflo	auses of separate sewer overflows from the ow and resultant high flows affected perforn lift stations, or treatment plant at any time	nance or created p	roblems in		
If Yes, please describe:					
5.3 Explain any infiltrati	on/inflow (I/I) changes this year from prev	ious years:			
member municipalities years of the PPI/I Prog projects. MMSD has a	I has been reduced over the past year. Twe s have PPI/I reduction projects completed o gram. Many of the municipalities also comp dopted peak flow performance standards in cipalities to reduce I/I. There were no new	r in progress in the leted public sector its Chapter 3 revis	e first 11 I/I reduction sions which		
5.4 What is being done	to address infiltration/inflow in your collecti	on system?			

MMSD continues sewer rehab through Operation and Maintenance, and Capital programs. MMSD is continuing to work with satellite municipalities to reduce inflow and infiltration with the wet weather peak flow management program. Throughout 2020 the District collected data from 194 permanent meters and 153 portable meters and also 150 surcharge level indicators in strategically selected sanitary sewers within its service area to more accurately measure wastewater flows under both dry and wet weather conditions. The measured peak flows are compared to the allowable peak flows listed in Chapter 3 of the District's rules. Action will be taken for any metersheds that are identified as exceeding the allowable peak flows. MMSD has implemented the Private Property Inflow and Infiltration (PPI/I) Reduction Program in 2011 to support municipal work in reducing I/I from local private property sources. Twenty-five of the twenty-eight member municipalities have PPI/I reduction projects completed or in progress in the 11th year of the PPI/I Program. Additionally, MMSD installed 36 Micrometers to enhance I/I data collection. MMSD completed and implemented the MMSD CMOM program in 2007 and has continued implementation annually. MMSD completed and implemented the MMSD CMOM program in 2007 and has continued implementation annually. In addition, all municipalities have developed and implemented CMOM and Asset Management programs. MMSD also has a Green Infrastructure (GI) initiative program that is aimed at capturing 740 million gallons of water every time it rains by the year 2035. In 2020 MMSD started a \$20M strategic green infrastructure installation program, called the Fresh Coast Protection Partnership (FCPP). This program is a public private partnership with Corvias; its goals center on ramping up the pace at which GI is installed within our GI Service area. The FCPP will work towards the goal of driving down the per-gallon total cost of GI, while cost effectively building local capacity and expertise in GI practices and producing the greatest impact on the District's local community and conveyance system. In 2020 alone, MMSD built 3,000,000 gallons worth of green infrastructure capture and by the end of 2020, the MMSD had built enough projects to total 37 MG of GI storage capacity each time it rains.

Total Points Generated	
Score (100 - Total Points Generated)	100
Section Grade	A

#### Milwaukee Metro Sew Dist Combined

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## **Grading Summary**

WPDES No: 0036820

SECTIONS	LETTER GRADE	GRADE POINTS	WEIGHTING FACTORS	SECTION POINTS
Influent	A	4	3	12
BOD/CBOD	A	4	10	40
TSS	A	4	5	20
Ammonia	A	4	5	20
Phosphorus	A	4	3	12
Biosolids	A	4	5	20
Staffing/PM	A	4	1	4
OpCert	A	4	1	4
Financial	A	4	1	4
Collection	A	4	3	12
TOTALS			37	148
GRADE POINT AVERAGE (GPA) = 4.00				

Notes:

A = Voluntary Range (Response Optional)

B = Voluntary Range (Response Optional)

C = Recommendation Range (Response Required)

D = Action Range (Response Required)

F = Action Range (Response Required)

	-	
Milwaukee Metro Sew Dist Combined	Last Updated:	Reporting For:
	5/7/2021	2020

## **Resolution or Owner's Statement**

Name of Governing				
Body or Owner:	MMSD Commission			
Date of Resolution or				
Action Taken:	2021-06-28	]		
Resolution Number:		]		
Date of Submittal:				
ACTIONS SET FORTH BY				CMAR
SECTIONS (Optional for g Influent Flow and Loadings		d for grade C, D, o	r F):	
Effluent Quality: BOD: Gra	de = A			
Effluent Quality: TSS: Grad	le = A			
Effluent Quality: Ammonia	: Grade = A			
Effluent Quality: Phosphore	us: Grade = A			
Dissolide Quality and Mana	company Crada A			
Biosolids Quality and Mana	$\underline{gement: Grade} = A$			
Staffing: Grade = A				
Operator Certification: Gra	de = A			
Financial Management: Gra	ade = A			
Collection Systems: Grade		tion Systems if SSO	s were reported)	
(Regardless of grade, response required for Collection Systems if SSOs were reported)				

The District continues to consistently meet CSO Performance Standards for water quality based requirements as outlined in our permit. As stated in the current WPDES Permit (Section 4.3.3 (10): "The permittee has submitted the documentation that demonstrated implementation of each of the nine minimum controls in accordance with Section IIB of the U.S. EPA CSO Control Policy. The permittee submitted this documentation to the Department as an element of its 2020 Facilities Plan, approved by the Department on December 26, 2007." Not content with just maintaining status quo, however, the District has a goal of 0 CSOs as targeted in our 2035 Vision Statement. The District's 6-year Long Range Financing Plan includes \$1.5 billion (\$858 million in projects and \$633 million in debt service) to maintain and improve the regional capital infrastructure that helps protect public health, homes, businesses and waterways. This includes spending to fix private property sources of excess water that can overwhelm sanitary sewer systems. Having already committed \$4 billion for clean water infrastructure in previous years, MMSD's asset management is vital for optimizing reliability and performance of new and aging resources for our treatment plants, sewers, and flood management facilities.

# ACTIONS SET FORTH BY THE GOVERNING BODY OR OWNER RELATING TO THE OVERALL GRADE POINT AVERAGE AND ANY GENERAL COMMENTS

(Optional for G.P.A. greater than or equal to 3.00, required for G.P.A. less than 3.00) **G.P.A. = 4.00**