

MS4 General Permit (DRAFT)
Town of Montville 2023 Annual Report
Permit Number GSM 00067
January 1, 2023 – December 31, 2023
Primary MS4 Contact: Mr. John Carlson, DPW Director, (860) 848-7473 email: Jcarlson@montville-ct.org

This report documents Town of Montville's efforts to comply with the conditions of the MS4 General Permit to the maximum extent practicable (MEP) from January 1, 2023 to December 31, 2023.

Part I: Summary of Minimum Control Measure Activities

1. Public Education and Outreach (Section 6 (a)(1) / page 19)

1.1 BMP Summary

BMP	Activities in current reporting period	Sources Used (if applicable)	Method of Distribution	Audience (and number of people reached)	Measurable Goal	Department / Person Responsible	Additional details
1-1 Implement public education and outreach	Maintain town website with information on program and informational links	Various including CTDEEP	Posted on town website	General Public	Website maintained with latest documents	DPW Director	Website continues to be updated yearly
1-2 Address education/outreach for pollutants of concern	Maintain town website with information on program and informational links appropriate to pollutants of concern	Various including CTDEEP	Posted on town website	General Public	Website maintained with latest documents	DPW Director	Website continues to be updated yearly

1.2 Describe any Public Education and Outreach activities planned for the next year, if applicable.

2. Public Involvement/Participation (Section 6(a)(2) / page 21)

2.1 BMP Summary

BMP	Status (Complete, Ongoing, In Progress, or Not started)	Activities in current reporting period	Measurable Goal	Department / Person Responsible	Date completed or projected completion date (include the start date for anything that is 'in progress')	Location Posted	Additional details
2-1 Final Stormwater Management Plan publicly available	Complete	Storm water Management Plan posted on website and filed with CTDEEP	SWMP Posted on town website	Engineering Consultant / DPW Director	April 1, 2023	Town Website	
2-2 Comply with public notice requirements for Annual Reports (annually by 2/15)	Complete	<i>Annual Report advertised, completed and posted</i>	<i>Annual Reports Posted on website</i>	Engineering Consultant / DPW Director	Feb 15, 2023	Town Website	

2.2 Describe any Public Involvement/Participation activities planned for the next year, if applicable.

3. Illicit Discharge Detection and Elimination (Section 6(a)(3) and Appendix B / page 22)

3.1 BMP Summary

BMP	Status (Complete, Ongoing, In Progress, or Not started)	Activities in current reporting period	Measurable Goal	Department / Person Responsible	Date completed or projected completion date (include the start date for anything that is 'in progress')	Additional details
3-1 Develop written IDDE program (Due 7/1/19)	Complete	None	<i>Develop written plan of IDDE program</i>	<i>Town's Engineering Consultant</i>	<i>Jul 1 2018</i>	
3-2 Develop list and maps of all MS4 stormwater outfalls in priority areas (Due 7/1/20)	Complete	None	<i>GIS Layer and Spreadsheet of MS4 Outfalls in Priority Areas</i>	<i>Town's Engineering Consultant</i>	<i>September 2019</i>	
3-3 Implement citizen reporting program (Ongoing)	Complete	None	<i>Establish Citizen's Reporting Program through the Town's website</i>	<i>DPW Director</i>	<i>April 1 2020</i>	https://www.townofmontville.org/department-services/public-works/stormwater-pollution-prevention/
3-4 Establish legal authority to prohibit illicit discharges (Due 7/1/19)	In Progress	None	Revised ordinance drafted from template	DPW/Planning		
3-5 Develop record keeping system for IDDE tracking (Due 7/1/17)	Complete	None	<i>Interactive GIS Layer</i>	<i>CLA Engineers</i>	<i>July 2019</i>	
3-6 Address IDDE in areas with pollutants of concern	Complete	<i>Turbidity Report issued to DPW.</i>	<i>Investigate and begin addressing IDDE in areas with pollutants of concern</i>	<i>DPW Director/CLA Engineers</i>	<i>Ongoing through term of Permit</i>	

3.2 Describe any IDDE activities planned for the next year, if applicable.

Update the written IDDE program as needed throughout the permit term.

Maintain master IDDE tracking spreadsheet and ensure all employees involved in IDDE program understand the logging process.

Begin dry and wet weather Catchment Investigation Procedure

3.3 Provide a record of all citizen reports of suspected illicit discharges and other illicit discharges occurring during the reporting period and SSOs occurring July 2017 through end of reporting period using the following table. Illicit discharges are any unpermitted discharge to waters of the state that do not consist entirely of stormwater or uncontaminated groundwater except those discharges identified in Section 3(a)(2) of the MS4 general permit when such non-stormwater discharges are not significant contributors of pollution to a discharge from an identified MS4.

Location (Lat long/ street crossing /address and receiving water)	Date and duration of occurrence	Discharge to MS4 or surface water	Estimated volume discharged	Known or suspected cause / Responsible party	Corrective measures planned and completed (include dates)	Sampling data (if applicable)

3.4 Provide a summary of actions taken to address septic failures using the table below.

Method used to track illicit discharge reports	Location and nature of structure with failing septic systems	Actions taken to respond to and address the failures		Impacted waterbody or watershed, if known	Dept. / Person responsible

3.5 Briefly describe the method and effectiveness of said method used to track illicit discharge reports.

The illicit discharges are tracked on the infrastructure GIS layer maintained by the town's engineering consultant CLA Engineers Inc.

3.6 IDDE reporting metrics

Metrics	
Estimated or actual number of MS4 outfalls	425 (<i>Mapped</i>)
Estimated or actual number of interconnections	6 (<i>Estimated</i>)
Outfall mapping complete	95%
Interconnection mapping complete	90%
System-wide mapping complete (detailed MS4 infrastructure)	100% (<i>Priority Area</i>)
Outfall assessment and priority ranking	100%
Dry weather screening of all High and Low priority outfalls complete	100%
Catchment investigations complete	20%
Estimated percentage of MS4 catchment area investigated	0%

3.7 Briefly describe the IDDE training for employees involved in carrying out IDDE tasks including what type of training is provided and how often it is given (minimum once per year).

No training performed in 2023. Training is planned for spring 2024.

4. Construction Site Runoff Control (Section 6(a)(4) / page 25)

4.1 BMP Summary

BMP	Status (Complete, Ongoing, In Progress, or Not started)	Activities in current reporting period	Measurable Goal	Department / Person Responsible	Date completed or projected completion date (include the start date for anything that is 'in progress')	Additional details
4-1 Implement, upgrade, and enforce land use regulations or other legal authority to meet requirements of MS4 general permit (Due 7/1/20)	Complete	None	<i>Publish and Implement regulations</i>	<i>DPW Director and planning staff</i>	<i>May 2020</i>	
4-2 Develop/Implement plan for interdepartmental coordination in site plan review and approval (Ongoing)	<i>Completed under 2004 permit</i>	<i>The town planning IW and PW staff currently perform</i>	<i>Maintain paper files recording actions</i>	<i>DPW Director and planning staff</i>	<i>Ongoing</i>	
4-3 Review site plans for stormwater quality concerns (Ongoing)	<i>Completed under 2004 permit</i>	<i>The town planning IW and PW staff currently perform</i>	<i>Maintain paper files recording actions</i>	<i>DPW Director and planning staff</i>	<i>Ongoing</i>	
4-4 Conduct site inspections (Ongoing)	<i>Completed under 2004 permit</i>	<i>Complete Catchment Investigation – Turbidity</i>	<i>Maintain paper files recording actions</i>	<i>DPW Director and planning staff / CLA</i>	<i>Ongoing</i>	
4-5 Implement procedure to allow public comment on site development (Ongoing)	<i>Completed under 2004 permit</i>	<i>The town regulations currently allow</i>	<i>Maintain paper files recording actions</i>	<i>DPW Director and planning staff</i>	<i>Ongoing</i>	
4-6 Implement procedure to notify developers about DEEP construction stormwater permit (Ongoing)	<i>Completed under 2004 permit</i>	<i>The town planning IW and PW staff currently perform</i>	<i>Maintain paper files recording actions</i>	<i>DPW Director and planning staff</i>	<i>Ongoing</i>	

4.2 Describe any Construction Site Runoff Control activities planned for the next year, if applicable.

Continue to implement Town Ordinances and Regulations that control Construction Site Run-off

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5. Post-construction Stormwater Management (Section 6(a)(5) / page 27)

5.1 BMP Summary

BMP	Status (Complete, Ongoing, In Progress, or Not started)	Activities in current reporting period	Measurable Goal	Department / Person Responsible	Date completed or projected completion date (include the start date for anything that is 'in progress')	Additional details
5-1 Establish and/or update legal authority and guidelines regarding LID and runoff reduction in site development planning (Due 7/1/22)	In progress	Regulations under development	Written legal authority in place.	DPW Director and planning staff	Jul 1, 2024	
5-2 Enforce LID/runoff reduction requirements for development and redevelopment projects (Due 7/1/22)	In progress	Regulations under development	Written regulations in place	DPW Director and planning staff	Jul 1, 2024	
5-3 Identify retention and detention ponds in priority areas (Due 7/1/20)	In progress	10 Basins identified and inspected.	GIS layer completed	CLA/DPW Director	Jul 1, 2024	
5-4 Implement long-term maintenance plan for stormwater basins and treatment structures (Ongoing)	In progress		Plans and BMPS on file	CLA/DPW Director	Jul 1, 2024	

5-5 DCIA mapping (Due 7/1/20)	<i>Complete</i>		<i>GIS layer complete</i>	CLA/DPW Director	<i>Jul 1, 2020</i>	
5-6 Address post-construction issues in areas with pollutants of concern	<i>Not Begun</i>		<i>Record if Issues Addressed</i>	CLA/DPW Director		

5.2 Describe any Post-Construction Stormwater Management activities planned for the next year, if applicable.

- Implement long-term maintenance plan for stormwater basins and treatment structures
- Address post-construction issues in areas with pollutants of concern.

5.3 Post-Construction Stormwater Management reporting metrics

For details on this requirement, visit <https://nemo.uconn.edu/ms4/tasks/post-construction.htm>. Scroll down to the DCIA section.

Metrics	
Baseline (2012) Directly Connected Impervious Area (DCIA)	1,137 Acres
DCIA disconnected (redevelopment plus retrofits)	0
Retrofit projects completed	0
DCIA disconnected	0
Estimated cost of retrofits	\$
Detention or retention ponds identified	10

5.4 Briefly describe the method to be used to determine baseline DCIA.

The baseline DCIA for each watershed has been determined using the Sutherland Equations as presented in the Small MS4 Permit Technical Support Document, Revised April 2014 (Original Document, April 2011).

6. Pollution Prevention/Good Housekeeping (Section 6(a)(6) / page 31)

6.1 BMP Summary

BMP	Status (Complete, Ongoing, In Progress, or Not started)	Activities in current reporting period	Measurable Goal	Department / Person Responsible	Date completed or projected completion date (include the start date for anything that is 'in progress')	Additional details
6-1 Develop/implement formal employee training program (Ongoing)	Ongoing		<i>Annual training for staff</i>	CLA/DPW Director	Spring 2024	
6-2 Implement MS4 property and operations maintenance (Ongoing)	In progress	<i>Execute Existing SWPPS for town properties</i>	<i>Document Execution</i>	DPW Director	April 2017	
6-3 Implement coordination with interconnected MS4s	On going		<i>Document to file as needed</i>	CLA/DPW Director		
6-4 Develop/implement program to control other sources of pollutants to the MS4	Not begun			CLA/DPW Director		
6-5 Evaluate additional measures for discharges to impaired waters*	Not begun			CLA/DPW Director		
6-6 Track projects that disconnect DCIA (Ongoing)	Not begun			CLA/DPW Director		

6-7 Implement infrastructure repair/rehab program (Due 7/1/21)	<i>Not begun</i>			<i>DPW Director</i>		
6-8 Develop/implement plan to identify/prioritize retrofit projects (Due 7/1/20)	<i>Commenced</i>	<i>Investigation has commenced to identify potential retrofit candidates with a goal of converting existing detention basin to infiltration basin.</i>	<i>Development of Plan</i>	<i>DPW Director</i>	<i>Spring 2024</i>	
6-9 Implement retrofit projects to disconnect 2% of DCIA (Due 7/1/22)	<i>Not begun</i>			<i>DPW Director</i>		
6-10 Develop/implement street sweeping program (Ongoing)	<i>Complete</i>	<i>Annual sweeping</i>	<i>Document to file</i>	<i>DPW Director</i>		
6-11 Develop/implement catch basin cleaning program (Ongoing)	<i>Complete</i>	<i>Cleaned 40-50% of basins, GPS location and volumes</i>	<i>GIS layer developed</i>	<i>DPW Director</i>		
6-12 Develop/implement snow management practices (Due 7/1/18)	<i>Complete</i>			<i>DPW Director</i>		

6.2 Describe any Pollution Prevention/Good Housekeeping activities planned for the next year, if applicable.

In addition to those site identified by the UCONN Water Corps, municipal stormwater detention basins will be reviewed for their potential to be converted to retention basins.

6.3 Pollution Prevention/ Good Housekeeping reporting metrics

Metrics	
Employee training provided for key staff	
Street sweeping	
Curb miles swept	30 miles
Volume (or mass) of material collected	
Catch basin cleaning	
Total catch basins in priority areas (value will be less than or equal to total catch basins town or institution-wide)	2,030 (Mapped)
Total catch basins town- (or institution-) wide	2,553 (Mapped)
Catch basins inspected	2,553
Catch basins cleaned	500 (Est)
Volume (or mass) of material removed from all catch basins	200 TONS est
Volume removed from catch basins to impaired waters (if known)	unknown
Snow management	
Type(s) of deicing material used	Treated Salt/Sand & Salt
Total amount of each deicing material applied	Sand & Salt 500 tons est
Type(s) of deicing equipment used	CIRUS w/ Electronic S
Lane-miles treated (A lane-mile is a mile of roadway in a single driving lane)	
Snow disposal location	
Staff training provided on application methods & equipment	
Municipal turf management program actions (for permittee properties in basins with N/P impairments)	
Reduction in application of fertilizers (since start of permit)	5%
Reduction in turf area (since start of permit)	NONE
Lands with high potential to contribute bacteria (dog parks, parks with open water, & sites with failing septic systems)	
Cost of mitigation actions/retrofits	\$0

6.4 Catch basin cleaning program

Provide any updates or modifications to your catch basin cleaning program.

Engineering consultant to initiate coordination and determine potential for disconnect project(s).

6.5 Retrofit program

Briefly describe the Retrofit Program identification and prioritization process, the projects selected for implementation, the rationale for the selection of those projects and the total DCIA to be disconnected upon completion of each project. (Due 7/1/20)

Describe plans for continuing the Retrofit program and how to achieve a goal of 1% DCIA disconnection annually in future years. (Due 7/1/22)

Part II: Impaired waters investigation and monitoring

1. Impaired waters investigation and monitoring program

For details on this requirement, visit <https://nemo.uconn.edu/ms4/tasks/monitoring.htm>. Refer to the yellow column of the Monitoring comparison chart and the Impaired waters monitoring flowchart.

1.1 Indicate which stormwater pollutant(s) of concern occur(s) in your municipality or institution. This data is available on the MS4 map viewer: <http://s.uconn.edu/ctms4map>.

Nitrogen/ Phosphorus

Bacteria

Mercury

Other Pollutant of Concern

1.2 Describe program status

Discuss 1) the status of monitoring work completed, 2) a summary of the results and any notable findings, and 3) any changes to the Stormwater Management Plan based on monitoring results.

Field investigations identified 12 outfalls directly connected to impaired waters in Montville. Between August and October 2019, these outfalls were sampled during wet weather conditions. Follow up monitoring of the 6 worst outfalls contributing to pollution was performed in November 2020, September 2021, and Summer 2023. Catchment investigation commenced in October 2021. Five outfalls were observed during wet weather conditions. Investigations concluded with Turbidity Report which determined followup measures be performed for one catchment (Outfall #108).

2. Screening data for outfalls to impaired waterbodies (Section 6(i)(1) / page 41)

2.1 Screening data

Complete the table below to report data for any wet weather sampling completed for MS4 outfalls that discharge directly to a stormwater impaired waterbody during the reporting period. For details on this requirement, visit www.nemo.uconn.edu/ms4/tasks/monitoring.htm. Refer to the yellow column of the Monitoring comparison chart and the Impaired waters monitoring flowchart.

Each Annual Report will add on to the previous year's data showing a cumulative list of sampling data. **You may also attach an excel spreadsheet with the same data rather than copying it into this table.** If you do attach a spreadsheet, please write "See Attachment" below.

Outfall_ID	Latitude	Longitude	Date Sampled	Impaired Waterbody	Water Classification	Fecal Coliform	Enterococcus	E Coli (MPN/100mls)	Total Coliforms (MPN/100 mls)	Turbidity (NTU)	Turbidity Difference (<5 NTU)	Pollutant Exceeded	
118	41.4365946	-72.1061936	7/10/2023	Oxoboko Brook	B			10500	>24200	130	99	Yes	
153	41.4367730	-72.1097366	7/10/2023	Oxoboko Brook	B					4	Lower @ Discharge	No	
181	41.4500624	-72.1010115	7/10/2023	Thames River (Middle)	SB			>24200*			5	Lower @ Discharge	Yes
182	41.4492767	-72.1005923	7/10/2023	Thames River (Middle)	SB	>24200*	10500*			20	Lower @ Discharge	Yes	
330	41.4553339	-72.1431821	7/10/2023	Oxoboko Brook	B					300	285**	Yes	
153 US			7/10/2023	Oxoboko Brook	B					31	Used for Reference Only	N/A	
181/182 US			7/10/2023	Thames River (Middle)	SB					60	Used for Reference Only	N/A	
330 US			7/10/2023	Oxoboko Brook	B					15	Used for Reference Only	N/A	

* Sampled and tested 9/13/23 due to prior processing error by Phoenix Labs

** Turbidity was investigated and reported in Turbidity Report dated November 12, 2021

Follow-up investigation required (last column) if the following pollutant thresholds are exceeded:

Pollutant of concern	Pollutant threshold
Nitrogen	Total N > 2.5 mg/l
Phosphorus	Total P > 0.3 mg/l
Bacteria (fresh waterbody)	<ul style="list-style-type: none"> E. coli > 235 col/100ml for swimming areas or 410 col/100ml for all others Total Coliform > 500 col/100ml
Bacteria (salt waterbody)	<ul style="list-style-type: none"> Fecal Coliform > 31 col/100ml for Class SA and > 260 col/100ml for Class SB Enterococci > 104 col/100ml for swimming areas or 500 col/100 for all others
Other pollutants of concern	Sample turbidity is 5 NTU > in-stream sample

3. Follow-up investigations (Section 6(i)(1)(D) / page 43)

Provide the following information for outfalls exceeding the pollutant threshold.

Outfall ID	Status of drainage area investigation	Control measure to address impairment
108	Visited site during rain event to determine origins of turbidity	Install E&S control measures
106	Visited site during rain event to determine origins of turbidity	No further investigations necessary for turbidity
330	Visited site during rain event to determine origins of turbidity	Clean pipes
331	Visited site during rain event to determine origins of turbidity	No further investigations necessary for turbidity
153	Visited site during rain event to determine origins of turbidity	No further investigations necessary for turbidity

4. Prioritized outfall monitoring (Section 6(i)(1)(D) / page 43)

Once outfall sampling has been completed for at least 50% of outfalls to impaired waters, identify 6 of the highest contributors of any pollutants of concern. Begin monitoring these outfalls on an annual basis by July 1, 2021. **You may also attach an excel spreadsheet with the same data rather than copying it to this table.** If you do attach a spreadsheet, please write "See Attachment" below.

2020 Sampling Results (Six Worst Polluting Outfalls)

Outfall ID	Date Sampled	Flow	Temp.	Water Classification	Fecal Coliform (<260 col/100mls)	Enterococcus (<500 col/100mls)	E Coli (<410 col/mls)	Turbidity Difference (<5 NTU)
108	11/30/2020	Heavy	55.2	B			384	140
118	11/30/2020	Moderate	55.9	B			1110	
153	11/30/2020	Heavy	61.5	B			31	29
182	11/30/2020	Heavy	54.6	SB	13000	9210		
330	11/30/2020	Heavy	58.1	B			63	16
181	11/30/2020	Moderate	59.0	SB		5480		

2021 Sampling Results (Six Worst Polluting Outfalls)

Outfall ID	Latitude	Longitude	Date Sampled	Water Classification	Fecal Coliform (<260 col/100mls)	Enterococcus (<500 col/100mls)	E Coli (<410 col/mls)	Turbidity (NTU)	Turbidity Difference (<5 NTU)
108	41.45375981	-72.14121604	9/9/2021	B				4.66	3.26
118	41.43659459	-72.10619359	9/9/2021	B			1860	15.70	14.34
118 US	41.43659459	-72.10619359	9/9/2021	B				1.36	
153	41.43677295	-72.10973664	9/9/2021	B				30.10	28.82
153 US	41.43677295	-72.10973664	9/9/2021	B				1.28	
182	41.44927665	-72.10059225	9/9/2021	SB	24200	15500		60.40	58.62
330	41.45533385	-72.14318206	9/9/2021	B				8.32	6.92
330/108 US	41.45533385	-72.14318206	9/9/2021					1.40	
181	41.45006236	-72.10101147	9/9/2021	SB		24200		14.90	13.12
181/182 US	41.45006236	-72.10101147	9/9/2021					1.78	

2023 Sampling Results (Six Worst Polluting Outfalls)

Outfall_ID	Latitude	Longitude	Date Sampled	Impaired Waterbody	Water Classification	Fecal Coliform	Enterococcus	E Coli (MPN/100mls)	Total Coliforms (MPN/100 mls)	Turbidity (NTU)	Turbidity Difference (<5 NTU)	Pollutant Exceeded
118	41.4365946	-72.1061936	7/10/2023	Oxoboko Brook	B			10500	>24200	130	99	Yes
153	41.4367730	-72.1097366	7/10/2023	Oxoboko Brook	B					4	Lower @ Discharge	No
181	41.4500624	-72.1010115	7/10/2023	Thames River (Middle)	SB		>24200*			5	Lower @ Discharge	Yes
182	41.4492767	-72.1005923	7/10/2023	Thames River (Middle)	SB	>24200*	10500*			20	Lower @ Discharge	Yes
330	41.4553339	-72.1431821	7/10/2023	Oxoboko Brook	B					300	285**	Yes
153 US			7/10/2023	Oxoboko Brook	B					31	Used for Reference Only	N/A
181/182 US			7/10/2023	Thames River (Middle)	SB					60	Used for Reference Only	N/A
330 US			7/10/2023	Oxoboko Brook	B					15	Used for Reference Only	N/A

* Sampled and tested 9/13/23 due to prior processing error by Phoenix Labs

** Turbidity was investigated and reported in Turbidity Report dated November 12, 2021

Outfalls 181 & 182 were resampled on 9/13/2023 due to an error in processing by Lab.

Part III: Additional IDDE Program Data

1. Assessment and Priority Ranking of Catchments data (Appendix B (A)(7)(c) / page 5)

Provide a list of all catchments with ranking results (DEEP basins may be used instead of manual catchment delineations).

Outfall ID	Waterbody	DEEP Basin	Category	Ranking
4	Oxoboxo Lake	CT3004-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
48	Latimer Brook	CT2202-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
114	Shantok Brook	CT-E1_016-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
122	Stony Brook	CT3005-01_01	Low Priority	No Information on Screening Factors Available to Perform Ranking
125	Trading Cove Brook	CT3001-00_01	Low Priority	No Information on Screening Factors Available to Perform Ranking
148	Fox Brook	CT3004-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
164	Hunts Brook	CT3006-00_03	Low Priority	No Information on Screening Factors Available to Perform Ranking
174	Oxoboxo Brook	CT3004-00_01	Low Priority	No Information on Screening Factors Available to Perform Ranking
176	Fox Brook	CT3004-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
177	Oxoboxo Lake	CT3004-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
182	Thames River (Middle)	CT-E1_015-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
192	Sandy Brook	CT3006-00_03	Low Priority	No Information on Screening Factors Available to Perform Ranking
198	Oxoboxo Brook	CT3004-00_01	Low Priority	No Information on Screening Factors Available to Perform Ranking
215	Shantok Brook	CT-E1_016-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
220	Shantok Brook	CT-E1_016-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
228	Shantok Brook	CT-E1_016-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
243	Oxoboxo Lake	CT3004-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
245	Oxoboxo Brook	CT3004-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
247	Fox Brook	CT3004-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
254	Bogue Brook Reservoir	CT2202-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
255	Bogue Brook Reservoir	CT2202-00_02	Low Priority	No Information on Screening Factors Available to Perform Ranking
279	Shantok Brook	CT-E1_016-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
283	Shantok Brook	CT-E1_016-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
285	Shantok Brook	CT-E1_016-SB	Low Priority	No Information on Screening Factors Available to Perform Ranking
331	Oxoboxo Brook	CT3004-00_01	Low Priority	No Information on Screening Factors Available to Perform Ranking
378	Oxoboxo Brook	CT3004-00_01	Low Priority	No Information on Screening Factors Available to Perform Ranking
380	Oxoboxo Brook	CT3004-00_01	Low Priority	No Information on Screening Factors Available to Perform Ranking
397	Oxoboxo Brook	CT3006-00_03	Low Priority	No Information on Screening Factors Available to Perform Ranking

2. Outfall and Interconnection Screening and Sampling data (Appendix B (A)(7)(d) / page 7)

2.1 Dry weather screening and sampling data from outfalls and interconnections

This screening is the baseline IDDE dry weather screening. For details on this requirement, visit <https://nemo.uconn.edu/ms4/tasks/monitoring.htm>. Refer to the blue column of the Monitoring comparison chart and the IDDE baseline monitoring flowchart.

Provide sample data for outfalls where flow is observed, during dry weather, of outfalls and interconnections categorized as high or low priority in priority areas. Do not include problem or excluded catchments. Only include Pollutant of concern data for outfalls that discharge into stormwater impaired waterbodies. **You may also attach an excel spreadsheet with the same data rather than copying it to this table.** If you do attach a spreadsheet, please write "See Attachment" below.

Outfall ID	Date Sampled	Flow	Pollutants of Concern Required	Water Class	Enterococci (<500 col/100ml)	E Coli (<410 mg/l)	Total Coliforms (< 500 col/ml)	Chlorine (<0.02 mg/l)	Conductivity (umhos cm)	Surfactants (<0.25 mg/l)	Ammonia (<0.5 mg/l)	Nitrogen (<2.5 mg/l)	Salinity (PPT)	Phosphorus (<0.3 mg/l)	Turbidity Diff Recorded	Catchment Priority
4	8/9/2019	Trickling	No	A	86	13000	0.019	311	0.05	0.05	0.05	<0.5				High Priority
48	8/9/2019	Trickling	No	A	20	24200	0.019	177	0.05	0.05	0.05	<0.5				High Priority
114	7/16/2019	Heavy	No	A	10	24200	0.019	205	0.05	0.05	0.05	<0.5				High Priority
122	7/16/2019	Trickling	No	A	31	24200	0.019	345	0.05	0.05	0.05	<0.5				High Priority
125	7/16/2019	Moderate	No	A	10	24200	0.019	83	0.05	0.05	0.05	<0.5				High Priority
148	8/12/2015	Trickling	No	A	63	15500	0.019	177	0.05	0.05	0.05	<0.5				High Priority
164	9/30/2019	Trickling	No	AA	958	24200	0.019	234	0.61	0.35	0.35	<0.5				High Priority
174	7/17/2019	Trickling	No	B	10	24200	0.019	710	0.05	0.05	0.05	<0.5				High Priority
176	8/9/2019	Trickling	No	A	10	17300	0.019	315	0.05	0.05	0.05	<0.5				High Priority
177	8/9/2019	Trickling	No	A	602	19900	0.019	361	0.05	0.05	0.05	<0.5				High Priority
182	8/12/2019	Trickling	Yes	SB	31		0.019	508	0.05	0.05	4.25	< 0.5	0.022	Not Tested		High Priority
192	7/16/2019	Moderate	No	A	10	5170	0.019	166	0.05	0.05	0.05	<0.5				High Priority
198	9/30/2019	Moderate	No	B	85	4610	0.019	119	0.2	0.05	0.05	<0.5				High Priority
215	7/17/2019	Trickling	No	A	31	19900	0.019	206	0.05	0.05	0.05	<0.5				High Priority
220	7/16/2019	Trickling	No	A	20	19900	0.13	469	0.08	0.06	0.06	<0.5				High Priority
228	7/16/2019	Heavy	No	A	10	3260	0.03	375	0.05	0.05	0.05	<0.5				High Priority
243	8/9/2019	Trickling	No	A	10	13000	0.019	292	0.05	0.05	0.05	<0.5				High Priority
245	8/9/2019	Trickling	No	A	1450	24200	0.019	657	0.05	0.05	0.05	<0.5				High Priority
247	8/9/2019	Trickling	No	A	31	9800	0.019	362	0.05	0.05	0.05	<0.5				High Priority
254	9/30/2019	Trickling	No	AA	31	24200	0.019	67	0.05	0.05	0.05	<0.5				High Priority
255	8/9/2019	Trickling	No	AA	189	24200	0.019	368	0.05	0.05	0.05	<0.5				High Priority
279	7/16/2019	Moderate	No	A	253	24200	0.03	391	0.05	0.25	0.25	<0.5				High Priority
283	7/17/2019	Trickling	No	A	272	17300	0.03	274	0.05	0.05	0.05	<0.5				High Priority
285	7/16/2019	Trickling	No	A	20	8660	0.019	96	0.05	0.05	0.05	<0.5				High Priority
331	8/9/2019	Trickling	Yes	B	199	24200	0.05	67	0.05	0.08	0.28	<0.5	0.019	Not Tested		High Priority
378	9/17/2019	Trickling		A	8160	24200	0.019	237	0.05	0.08	0.08	<0.5				High Priority
380	7/17/2019	Moderate	No	B	10	345	0.019	665	0.05	0.05	0.05	<0.5				High Priority
397	7/16/2019	Trickling	No	A	20	5480	0.03	218	0.05	0.05	0.05	<0.5				High Priority

2.2 Wet weather sample and inspection data

This sampling data is the baseline wet weather priority catchment investigation sampling. For details on this requirement, visit <https://nemo.uconn.edu/ms4/tasks/monitoring.htm>. Refer to the green column of the Monitoring comparison chart and the IDDE catchment investigation flowchart.

Provide baseline sample data for outfalls and key junction manholes of any catchment area (all high priority, low priority, and problem outfalls within the priority area) with at least one System Vulnerability Factor. **You may also attach an excel spreadsheet with the same data rather than copying it to this table.** If you do attach a spreadsheet, please write “See Attachment” below.

Outfall / Interconnection ID	Latitude / Longitude	Sample date	Ammonia	Chlorine	Conductivity	Salinity	E. coli or Enterococcus	Surfactants	Water Temp	Pollutant of concern

3. Catchment Investigation data (Appendix B (A)(7)(e) / page 9)

For details on this requirement, visit [www.nemo.uconn.edu/ms4/tasks/monitoring.htm](https://nemo.uconn.edu/ms4/tasks/monitoring.htm). Refer to the green column of the Monitoring comparison chart and the IDDE catchment investigation flowchart.

3.1 System Vulnerability Factor Summary

For those catchments being investigated for illicit discharges (i.e. categorized as high priority, low priority, or problem) document the presence or absence of System Vulnerability Factors (SVF). If present, report which SVF's were identified. An example is provided below.

Outfall ID	Receiving Water	System Vulnerability Factors

Where SVFs are:

1. History of SSOs, including, but not limited to, those resulting from wet weather, high water table, or fat/oil/grease blockages.
2. Sewer pump/lift stations, siphons, or known sanitary sewer restrictions where power/equipment failures or blockages could readily result in SSOs.
3. Inadequate sanitary sewer level of service (LOS) resulting in regular surcharging, customer back-ups, or frequent customer complaints.
4. Common or twin-invert manholes serving storm and sanitary sewer alignments.
5. Common trench construction serving both storm and sanitary sewer alignments.
6. Crossings of storm and sanitary sewer alignments.
7. Sanitary sewer alignments known or suspected to have been constructed with an underdrain system;
8. Sanitary sewer infrastructure defects such as leaking service laterals, cracked, broken, or offset sanitary infrastructure, directly piped connections between storm drain and sanitary sewer infrastructure, or other vulnerability factors identified through Inflow/Infiltration Analyses, Sanitary Sewer Evaluation Surveys, or other infrastructure investigations.
9. Areas formerly served by combined sewer systems.
10. Any sanitary sewer and storm drain infrastructure greater than 40 years old in medium and densely developed areas.
11. Widespread code-required septic system upgrades required at property transfers (indicative of inadequate soils, water table separation, or other physical constraints of the area rather than poor owner maintenance).
12. History of multiple local health department or sanitarian actions addressing widespread septic system failures (indicative of inadequate soils, water table separation, or other physical constraints of the area rather than poor owner maintenance).

3.2 Key junction manhole dry weather screening and sampling data

This screening is the dry weather priority catchment investigation screening. Provide sample data, both baseline and follow-up, for key junction manholes of any catchment area begin investigated for an illicit discharge and do not have any SVFs present. Follow-up investigations must take place within one year and again within five years. **You may also attach an excel spreadsheet with the same data rather than copying it to this table.** If you do attach a spreadsheet, please write "See Attachment" below.

Key Junction Manhole ID	Latitude / Longitude	Screening / Sample date	Visual/ olfactory evidence of illicit discharge	Ammonia	Chlorine	Surfactants

3.3 Wet weather follow-up investigation outfall sampling data

This sampling is the follow-up investigations for the wet weather priority catchment investigation. Provide follow-up sample data for outfalls and key junction manholes of any catchment area with at least one System Vulnerability Factor. Follow-up investigations must take place within one year and

again within five years. You may also attach an excel spreadsheet with the same data rather than copying it to this table. If you do attach a spreadsheet, please write "See Attachment" below.

Outfall ID	Latitude / Longitude	Sample date	Ammonia	Chlorine	Surfactants

3.4 Data for each illicit discharge source confirmed through the catchment investigation procedure

Discharge location	Source location	Discharge description	Method of discovery	Date of discovery	Date of elimination	Mitigation or enforcement action	Estimated volume of flow removed

Part IV: Certification

"I have personally examined and am familiar with the information submitted in this document and all attachments thereto, and I certify that, based on reasonable investigation, including my inquiry of those individuals responsible for obtaining the information, the submitted information is true, accurate and complete to the best of my knowledge and belief. I understand that a false statement made in this document or its attachments may be punishable as a criminal offense, in accordance with Section 22a-6 of the Connecticut General Statutes, pursuant to Section 53a-157b of the Connecticut General Statutes, and in accordance with any other applicable statute."

Chief Elected Official or Principal Executive Officer	Document Prepared by
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Signature / Date:	Signature / Date:
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