

REPORT

February 15, 2019

TOWN OF
Thomaston
CONNECTICUT

2018 Stormwater Annual Report

CT DEEP General Permit for the
Discharge of Stormwater from Small
Municipal Separate Storm Sewer
Systems (MS4)



TABLE OF CONTENTS

	Page
I. INTRODUCTION / OVERVIEW.....	1
I.1 INTRODUCTION.....	1
I.2 TOWN INFORMATION.....	1
I.3 STORMWATER MONITORING.....	2
I.4 ANNUAL REPORT DEVELOPMENT TEAM.....	2
1 PUBLIC EDUCATION AND OUTREACH.....	1-1
1.1 BMP Summary.....	1-1
1.2 Public Education and Outreach Activities.....	1-2
1.3 Activities Implemented to Educate the Community on Stormwater.....	1-2
2 PUBLIC INVOLVEMENT / PARTICIPATION.....	2-1
2.1 BMP Summary.....	2-1
2.2 Public Involvement/ Participation Activities.....	2-2
2.3 Public Involvement/ Participation.....	2-2
3 ILLICIT DISCHARGE DETECTION AND ELIMINATION.....	3-3
3.1 BMP Summary.....	3-3
3.2 IDDE Activities.....	3-4
3.3 Citizen Reports.....	3-5
3.4 Illicit Discharges.....	3-5
3.5 Method Used to Track Illicit Discharge Reports.....	3-5
3.6 Actions Taken to Address Septic Failures.....	3-6
3.7 IDDE Reporting Metrics.....	3-6
3.8 IDDE Training for Employees.....	3-7
4 CONSTRUCTION SITE STORMWATER RUNOFF CONTROL.....	4-1
4.1 BMP Summary.....	4-2
4.2 Construction Site Runoff Control Activities.....	4-4
5 POST-CONSTRUCTION STORMWATER MANAGEMENT.....	5-1
5.1 BMP Summary.....	5-2
5.2 Post-Construction Stormwater Management Activities.....	5-3
5.3 Post-Construction Stormwater Management Reporting Metrics.....	5-3
5.4 Method to Determine DCIA.....	5-4
6 POLLUTION PREVENTION / GOOD HOUSEKEEPING.....	6-1
6.1 BMP Summary.....	6-1
6.2 Pollution Prevention/ Good Housekeeping Activities.....	6-3
6.3 Pollution Prevention/ Good Housekeeping Reporting Metrics.....	6-4
6.4 Catch Basin Cleaning Program.....	6-5
7 MONITORING RESULTS.....	7-1
7.1 Impaired Waters Investigation and Monitoring Program.....	7-2
7.2 Screening Data for Outfalls to Impaired Waterbodies.....	7-3
8 ADDITIONAL IDDE PROGRAM DATA.....	8-1
8.1 Assessment and Priority Ranking of Catchments Data.....	8-1
8.2 Outfall and Interconnection Screening and Sampling Data.....	8-2
8.3 Catchment Investigation Data.....	8-3

9 CERTIFICATION AND SIGNATURE 9-1
9.1 CERTIFICATION REQUIREMENTS 9-1
9.2 PLAN CERTIFICATION AND SIGNATURE 9-1

2018 STORMWATER ANNUAL REPORT

LIST OF APPENDICES

Appendix AOutfall Maps

Appendix B Lab Report

I. INTRODUCTION / OVERVIEW

I.1 INTRODUCTION

This 2018 Stormwater Annual Report was developed by Weston & Sampson on behalf of the Town of Thomaston (Town). The Annual Report describes the status of compliance with the 2017 CTDEEP General Permit for the Discharge of Stormwater from Small Municipal Separate Storm Sewer Systems (MS4s). The Town has the Permit Number GSM 000039. Previous annual reports were written in compliance with the 2004 Permit. This is the second annual report for the 2017 Permit. The report includes an assessment of the identified best management practices (BMPs) in the Stormwater Management Plan (SWMP) and the progress towards achieving the implementation dates and measurable goals for each of the Minimum Control Measures. The report also includes stormwater monitoring data results for samples collected in 2018.

The six minimum control measures include:

1. Public Education and Outreach
2. Public Involvement / Participation
3. Illicit Discharge Detection and Elimination
4. Construction Site Stormwater Runoff Control
5. Post-Construction Stormwater Management
6. Pollution Prevention / Good Housekeeping

This report documents the Town's efforts to comply with the 2017 General Permit to the maximum extent practicable (MEP) for the period between January 1, 2018 to December 31, 2018 with updates on tasks to be completed in fiscal year 2018 ending in June 2019.

I.2 TOWN INFORMATION

The Town of Thomaston covers an area of approximately 12.2 square miles and is home to approximately 7,887 residents according to the 2010 Census. Approximately 9.1 square miles of the Town is classified as Urbanized Area (UA) according to the 2010 Census. Approximately 0.2 square miles of the Town is comprised of waterbodies and watercourses. An outfall map that includes urbanized area is included in Appendix A.

Sub regional drainage basins and major watercourses include the Naugatuck River, Leadmine Brook, Northfield Brook and Branch Brook. These are part of the Naugatuck River major drainage basin. In addition, there are several significant lakes and ponds within the town including Wigwag Reservoir, Nystrom Pond and Morton Pond.

The Town of Thomaston has a Selectman-Town Meeting form of government, which is led by the First Selectman. The Highway Department is responsible for all public property including buildings, roads, parking lots, roadsides and parks. Several commissions within the Town have jurisdiction over development and include the following:

- Conservation Commission
- Inland Wetlands and Watercourses Commission

- Planning & Zoning Commission

I.3 STORMWATER MONITORING

The 2017 General Permit requires towns to conduct wet weather screening of outfalls that discharge to impaired waters, beginning July 1, 2018. At least fifty percent (50%) of these outfalls shall be screened by July 1, 2020, and one hundred percent (100%) of the outfalls shall be screened by July 1, 2022. Outfalls will require follow-up investigation if the results are greater than the parameters listed in the General Permit. The six outfalls with the highest contribution of any of the pollutants of concern will be determined by July 1, 2021. These six priority outfalls will be monitored annually.

I.4 ANNUAL REPORT DEVELOPMENT TEAM

As part of the development of the SWMP, a project team was established with representatives of the Town and the Town's consultant for this assignment, Weston & Sampson. The same team developed this 2018 Annual Report (second year after the revised permit). A list of the project team is provided below.

Table 1.1 SWMP DEVELOPMENT TEAM

Name	Organization & Title
Edmond V. Mone	Town of Thomaston First Selectmen
Glenn Clark	Town of Thomaston Superintendent of Highways
Jeremy Leifert	Town of Thomaston Land Use Administrator
Raju Vasamsetti, P.E.	Weston & Sampson Project Manager
Lauren Coles, E.I.T.	Weston & Sampson Project Engineer

1 PUBLIC EDUCATION AND OUTREACH

Under the General Permit Section 6(a)(1), the Town is required to “implement a public education program to distribute educational materials to the permittee’s community or conduct equivalent outreach activities about the sources and impacts of stormwater discharges on waterbodies and the steps that the public can take to reduce pollutants in stormwater runoff.” The following BMPs were selected by the Town to address the Public Education and Outreach minimum control measure of the General Permit (Section 6(a)(1)/page19):

1.1 BMP Summary

Table 1.1 Public Education and Outreach BMP Measurable Goals and Implementation Dates & Status							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
1-1 Implement public education and outreach	Complete	<ul style="list-style-type: none"> Continue to display in Town Hall and at Inland Wetland and Watercourses Commission Meetings. The SWMP and links to stormwater websites are posted on the Town website. 	Brochure/ Fact Sheets and Town Website.	Superintendent of Highways, Land Use Administrator, Webmaster	Ongoing		
1-2 Address education/ outreach for pollutants of concern.	Complete	Continue to maintain information in the Library of Education Materials located at the Town Hall.	Public has access to Library of Educational Materials that contains specifics about pollutants of concern.	Superintendent of Highways, Land Use Administrator	Ongoing		

1.2 Public Education and Outreach Activities

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

The Town will continue to display brochures/fact sheets at the Town Hall and at Inland Wetland and Watercourses Commission meetings. The Town will begin to display/distribute fact sheets at Planning and Zoning meetings. The links to stormwater information online will be updated as new material becomes available. The information in the printed and online fact sheets will be updated when new information becomes available.

1.3 Activities Implemented to Educate the Community on Stormwater

Table 1.2 Details of Activities Implemented to Educate The Community on Stormwater

Program Element/Activity	Audience (and number of people reached)	Topic(s) covered	Pollutant of Concern addressed (if applicable)	Responsible dept. or partner org.
Brochures/ Fact sheets at Town Hall and Inland Wetland Meetings	Developers, home owners (approx.. 100)	Sources of Stormwater pollutants (car oil, fertilizer, pet waste), LID- Rain Gardens	Bacteria	Superintendent of Highways, Land Use Administrator
Stormwater Information on Website http://www.thomastonct.org/content/161/220/1826/default.aspx	Information is available to anyone who views the town website including Developers and Town residents	Sources of Stormwater pollutants (car oil, fertilizer, pet waste), LID- Rain Gardens	Bacteria	Superintendent of Highways, Land Use Administrator

2 PUBLIC INVOLVEMENT / PARTICIPATION

Under the General Permit Section 6(a)(2), the Town is required to “provide opportunities to engage their community to participate in the review and implementation of the permittee’s Plan.” Public participation benefits the program by increasing public support, including additional expertise and involving community groups/ organizations. The following BMPs were selected by the Town to address the Public Involvement / Participation minimum control measure of the General Permit (Section 6(a)(2)/page 21):

2.1 BMP Summary

Table 2.1 Public Involvement/Participation BMP Measurable Goals and Implementation Dates & Status							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
2-1 Continue availability of Final Stormwater Management Plan to the public.	Ongoing	Posted Stormwater Management Report online.	Post Stormwater Management Report online.	First Selectman, Superintendent of Highways, Webmaster	Ongoing		
2-2 Comply with public notice requirements for Annual Reports	Ongoing/ In Progress	Post Annual Report online. This will be completed by 2/15/2019.	Post Annual Report online.	First Selectman, Superintendent of Highways, Webmaster	2/15/2019	Projected 2/15/2019	
2-3 Brochures/ factsheets at Town Hall and Inland Wetland and Watercourses Commission Meetings	Complete	Updated brochures/ fact sheets. Continue to display in Town Hall and at Inland Wetland and Watercourses Commission Meetings.	Place Brochure/ Fact Sheets at Town Hall and display at Inland Wetland and Watercourses Commission Meetings.	Land Use Administrator, Webmaster	Ongoing		
2-4 Storm drain plaques	Ongoing/ In progress	Installed between 50 and 75 storm drain plaques.	Mark catch basins annually.	Superintendent of Highways	Not specified	Ongoing	

2.2 Public Involvement/ Participation Activities

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

Brochures/ Factsheets will remain posted at the Town Hall.

Next year’s annual report will be posted online.

Storm drain marking/stenciling is ongoing.

2.3 Public Involvement/ Participation

Table 2.2 Public Involvement/ Participation Reporting Metrics			
Metrics	Implemented	Date	Posted
Availability of the Stormwater Management Plan announced to public	Yes	7/1/2017	http://www.thomastonct.org/content/163/238/default.aspx
Availability of Annual Report announced to public	On Schedule	Projected 2/15/2019	http://www.thomastonct.org/content/163/238/default.aspx

3 ILLICIT DISCHARGE DETECTION AND ELIMINATION

Under the General Permit Section 6(a)(3), the Town is required to develop a written Illicit Discharge Detection and Elimination (IDDE) program. The IDDE program is designed to “provide the legal authority to prohibit and eliminate illicit discharges to the MS4; find the source of any illicit discharges; eliminate those illicit discharges; and ensure ongoing screening and tracking to prevent and/ or eliminate future illicit discharges.” The following BMPs were selected by the Town to address the Illicit Discharge Detection and Elimination minimum control measure of the General Permit (Section 6(a)(3) and Appendix B/page 22):

3.1 BMP Summary

Table 3.1 Illicit Discharge Detection and Elimination BMP Measurable Goals and Implementation Dates & Status							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
3-1 Develop written IDDE program	Completed	The Town completed its written IDDE program based on the IDDE program template developed by UCONN's CT NEMO Program.	Develop written plan of IDDE program	Superintendent of Highways	7/1/2018	Completed Feb. 2019	
3-2 Develop list and maps of all MS4 stormwater outfalls in priority areas	Ongoing/ In progress	Perform field survey with GPS to survey outfalls. Update database and map (GIS).	GIS maps with updated outfalls in priority areas	Superintendent of Highways, Webmaster Consultant	7/1/2019	Completed Fall 2018	The Town has previously located all the outfalls, and they are available in GIS through NVCOG and also included in Appendix A. The outfalls in the priority areas were reviewed in the field during the summer of 2018 during dry weather screening.

Table 3.1 Illicit Discharge Detection and Elimination BMP- Continued

BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
3-3 Implement citizen reporting program	Ongoing	The Town website has a Contact Us Form. The Citizen Reporting Program is described in Section 3 of the IDDE Report	Post point of contact phone number and Contact Us Form listed on the Town website.	Superintendent of Highways	7/1/2017	Completed 7/1/2017	Contact Us Form at: http://www.thomastonct.org/content/80/621.aspx Main phone number is listed on the website 860-283-4421
3-4 Establish legal authority to prohibit illicit discharges	Completed	The Town wrote and implemented a Town Ordinance regarding non-stormwater discharges based on the template produced by UCONN's CT NEMO Program.	Write and implement a Town Ordinance	Land Use Administrator, Superintendent of Highways	7/1/2018	Completed 10/10/2018	The ordinance is based on the CT NEMO template.
3-5 Develop record keeping system for IDDE tracking	Ongoing/ In progress	The previous IDDE plan is still in effect, and the record keeping system was updated in the IDDE report.	Document IDDE findings in Annual Reports	WPCA, Superintendent of Highways	7/1/2017	Completed 7/1/2017	
3-6 Address IDDE in areas with pollutants of concern	Ongoing/ In progress	IDDE program prioritizes areas with pollutants of concern	IDDE program will address priority areas with high levels of Bacteria.	Superintendent of Highways	Not specified	Projected 7/1/2019	The outfalls in the priority areas were reviewed in the field during the summer of 2018 during dry weather screening..

3.2 IDDE Activities

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

Next year's Annual Report will contain updates made to the written IDDE program as needed throughout the permit term. MS4 system mapping will be continued by locating system components in the field. Dry weather screening was conducted in August 2018. All the outfalls were observed to be in good condition with no observed illicit discharge except for one outfall, which needs to be investigated further.

3.3 Citizen Reports

Citizen reports of suspected illicit discharges received during this reporting period.

Table 3.2 Suspected Illicit Discharge Reports		
Date of Report	Location / suspected source	Response taken
No reports received during reporting period		

3.4 Illicit Discharges

Record of illicit discharges occurring during the reporting period and SSOs occurring July 2012 through end of reporting period.

Table 3.3 SSO Reports						
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)
No records received during reporting period						

3.5 Method Used to Track Illicit Discharge Reports

Briefly describe the method used to track illicit discharge reports, responses to those reports, and who was responsible for tracking this information.

The Superintendent of Highways is responsible for tracking and responding to illicit discharge reports. The Torrington Area Health District is responsible for tracking septic records for the Town. The Town WPCA is responsible for tracking sanitary sewer records.

3.6 Actions Taken to Address Septic Failures

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

Table 3.4 Septic Failures		
Location and nature of structure with failing septic systems	Actions taken to respond to and address the failures	Impacted waterbody or watershed, if known
No actions required because no septic failures reported in 2018.		

3.7 IDDE Reporting Metrics

Table 3.5 IDDE Reporting Metrics	
Metrics	
Estimated or actual number of MS4 outfalls	250*
Estimated or actual number of interconnections	Unknown
Outfall mapping complete	100%
Interconnection mapping complete	0%
System-wide mapping complete (detailed MS4 infrastructure)	25%
Outfall assessment and priority ranking	90%
Dry weather screening of all High and Low priority outfalls complete	0
Catchment investigations complete	0
Estimated percentage of MS4 catchment area investigated	50%

*See Map of Outfalls in Appendix A.

3.8 IDDE Training for Employees

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

Employees including DPW staff received annual IDDE Training through a presentation given by Weston & Sampson on June 26, 2018. The training contained information on the 2017 MS4 Permit Requirements including illicit discharge identification and reporting and best management practices. Another training session will be provided in the spring of 2019 with more detailed information about IDDE and best management practices.

4 CONSTRUCTION SITE STORMWATER RUNOFF CONTROL

The Town shall “implement and enforce a program to control stormwater discharges (to its MS4) associated with land disturbance or development (including re-development) activities from sites with one acre or more of soil disturbance, whether considered individually or collectively as part of a larger plan.” The program will be consistent with “the 2002 Guidelines for Soil Erosion and Sedimentation Control, as amended, the Connecticut Stormwater Quality Manual, and stormwater discharge permits issued by DEEP within the municipal or institutional boundary pursuant to CGS 22a-430 and 22a-430b.” The permittee will conduct site plan reviews, site inspections, and include procedures for public involvement. The Town has local regulations (shown in Table 4.1) that require construction runoff control measures.

Table 4.1 Stormwater Regulations

Regulations	Date	Erosion & Sediment Controls	Site Plan Review	Site Inspection and Enforcement
Zoning Regulations	2016	Article 2.47 Soil Erosion and Sediment Control Plan Article 10.3.d Sediment and Erosion Control Plan	Article 17, Site Plan Review	Article 14, Administration and Enforcement Article 19, Sedimentation and Erosion Control Bond Article 21, 21.1, Site Inspection
Subdivision Regulations	2014	Article 8 Erosion and Sedimentation Control Plan	Article 3 Application Requirements and Procedures	Article 3, 3.5, Inspection by the Town Engineer Article 14, Administrative Procedures
Inland Wetlands and Watercourse Regulations	2008	Section 7.6.b	Section 10.2, Criteria for Decision	Section 14.2 and 14.5, Enforcement

The following BMPs were selected by the Town to address the Construction Site Stormwater Runoff Control minimum control measure of the General Permit (Section 6(a)(4)/page 25):

4.1 BMP Summary

Table 4.2 Construction Site Stormwater Runoff Control BMP Measurable Goals and Implementation Dates & Status							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
4-1 Implement, upgrade, and enforce land use regulations or other legal authority to meet requirements of MS4 general permit	Ongoing/ In progress	Review and revise current town land use regulations to include reference to specific documents for design of sedimentation and erosion control BMPs	Upgrade and enforce land use regulations.	Superintendent of Highways, Planning & Zoning Commission, Inland Wetlands Commission	7/1/2019	Projected 7/1/2019	Zoning Regulations, Subdivision Regulations, and Inland Wetland and Watercourses Regulations will be updated.
4-2 Develop/Implement plan for interdepartmental coordination in site plan review and approval	Complete	Site plans shall be submitted to the Zoning Commission. The Town Engineer will conduct a detailed engineering review of the site plan. The Land Use Inspector circulates the Site Plan submission to all applicable boards, commissions, and departments for review and comment.	Zoning Commission and Town Engineer review site plans in accordance with the various town regulations.	Planning & Zoning Commission, Land Use Administrator	7/1/2017	Completed 7/1/2017	See regulations listed in Table 4.1.
4-3 Review site plans for stormwater quality concerns	Complete	Zoning Regulations require Sediment and Erosion Control Plans. Zoning Commission, and Town Engineer follow Site Plan Review Procedures.	Zoning Commission and Town Engineer review plans for stormwater quality concerns in accordance with regulations.	Planning & Zoning Commission, Inland Wetlands, and Watercourse Commission	7/1/2017	Completed 7/1/2017	See regulations listed in Table 4.1. Also, require Site Stormwater Management Checklist from 2004 Connecticut Stormwater Quality Manual.

Table 4.2 Construction Site Stormwater Runoff Control BMP (Continued)							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
4-4 Conduct site inspections	Complete	The Enforcement Officer (Land Use Administrator or consultant) inspects sedimentation and erosion control measures to ensure that they are in compliance with approved plans, properly installed, functioning and maintained by the applicant.	The Enforcement Officer conducts site inspections	Land Use Administrator Enforcement Officer	7/1/2017	Completed 7/1/2017	See regulations listed in Table 4.1.
4-5 Implement procedure to allow public comment to site development	Complete	The Town utilizes their government structure for processing information submitted by the public for receipt and consideration. Information submitted by the public is forwarded to the appropriate Department within the Town's government structure for consideration.	Public comments are forwarded to the appropriate Department.	First Selectman, Land Use Administrator	7/1/2017	Completed 7/1/2017	
4-6 Implement procedure to notify developers about DEEP construction stormwater permit	Complete	Continue notifying construction site developers and operators of requirements for registration.	Communicate to developers about DEEP construction stormwater permit through permitting process.	Land Use Administrator	7/1/2017	Completed 7/1/2017	

4.2 Construction Site Runoff Control Activities

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

The Zoning Commission and Town Engineer will continue to review site plans in accordance with the various town regulations.

The Zoning Enforcement Officer (Land Use Administrator or consultant) will continue to conduct site inspections.

The Town Departments will continue to communicate to developers about DEEP construction stormwater permit through permitting process.

5 POST-CONSTRUCTION STORMWATER MANAGEMENT

The Town shall require developers to “consider the use of low impact development (LID) and runoff reduction site planning and development practices prior to the consideration of other practices in the permittee’s land use regulations, guidance or construction project requirements to meet or exceed those LID and runoff reduction practices identified in the Stormwater Quality Manual.”

The Town currently has the following procedures for the enforcement of the stormwater regulations:

Zoning Regulations

July 1, 2016

Article 14, Administration and Enforcement

Subdivision Regulations

October 3, 2014

Article 14, Administrative Procedures

Inland Wetland and Watercourse Regulations

June 25, 2014

Section 6, Regulated Activities to be Licensed

Section 14, Enforcement

The following BMPs were selected by the town to address the Post-Construction Stormwater Management minimum control measure of the General Permit (Section 6(a)(5)/page 27):

5.1 BMP Summary

Table 5.1 Post-Construction Stormwater Management BMP Measurable Goals and Implementation Dates & Status							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
5-1 Establish and/or update legal authority and guidelines regarding LID and runoff reduction in site development planning	Ongoing/ In Progress	Continue procedures for addressing post-construction BMPs including projects with 1 to 5 acres in disturbance. Formally, revise regulations by 7/1/2021.	Update regulations.	Land Use Administrator	7/1/2021	Projected 7/1/2021	Update Subdivision Regulations, Zoning Regulations, and Inland Wetlands and Watercourse Regulations to include LID.
5-2 Enforce LID/runoff reduction requirements for development and redevelopment projects	Ongoing/ In Progress	Enforce LID/ runoff reduction regulations through site plan review.	Development and redevelopment projects will include LID/ runoff reduction measures.	Superintendent of Highways	7/1/2019	Projected 7/1/2020	
5-3 Identify retention and detention ponds in priority areas	Not started	Identify retention and detention ponds in priority areas has not started.	Identify retention and detention ponds in priority areas	Superintendent of Highways	7/1/2019	Projected 7/1/2019	
5-4 Implement long-term maintenance plan for stormwater basins and treatment structures	Ongoing/ In Progress	Implementing long-term maintenance of stormwater basins and treatment structures through scheduled maintenance based on template from UCONN's CT NEMO Program.	Inspect and maintain basins and structures in accordance with long-term plan.	Superintendent of Highways	7/1/2019	Projected 7/1/2019	Inspect basins and structures every five years and clean when filled with sediment.

Table 5.1 Post-Construction Stormwater Management BMP (Continued)

BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
5-5 DCIA mapping	Not started	Develop and analyze DCIA maps starting after 7/1/2019.	Update DCIA mapping.	Superintendent of Highways, Webmaster	7/1/2020	Projected 7/1/2020	
5-6 Address post-construction issues in areas with pollutants of concern	Not started	Inspect construction areas in areas with pollutants of concern,	Enforce construction BMPs.	Superintendent of Highways	Not Specified	Projected 7/1/2020	

5.2 Post-Construction Stormwater Management Activities

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

Development and redevelopment projects will include LID/ runoff reduction measures.

Town committees will continue procedures for addressing post-construction BMPs including projects with 1 to 5 acres in disturbance.

Develop a Maintenance Plan for stormwater ponds and treatment structures by July 2019.

5.3 Post-Construction Stormwater Management Reporting Metrics

Table 5.2 Post-Construction Stormwater Management Metrics

Baseline (2012) Directly Connected Impervious Area (DCIA)	In progress
DCIA disconnected (redevelopment plus retrofits)	In progress
Retrofits completed	None
DCIA disconnected	In progress
Estimated cost of retrofits	N/A
Detention or retention ponds identified	None

5.4 Method to Determine DCIA

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

The Town will choose from the following methods developed by CT NEMO:

- Method 1 involves assuming impervious Cover (IC) from the CT NEMO map is 100% connected; therefore, IC will equal DCIA.
- Method 2 involves using the equations on UConn NEMO's website to estimate DCIA based on the development density in each basin.
- Method 3 involves calculating DCIA through map analysis and field checking.

A combination of the above mentioned three methods will be utilized.

6 POLLUTION PREVENTION / GOOD HOUSEKEEPING

Under the General Permit Section 6(a)(6), the Town shall “implement an operations and maintenance program for permittee-owned or – operated MS4s that has a goal of preventing or reducing pollutant runoff and protecting water quality from all permittee-owned or – operated MS4s.” The following BMPs were selected by the town to address the Pollution Prevention/ Good Housekeeping minimum control measure of the General Permit (Section 6(a)(6)/ page 31):

6.1 BMP Summary

Table 6.1 Pollution Prevention/ Good Housekeeping BMP Measurable Goals and Implementation Dates & Status							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
6-1 Develop/Implement formal employee training program	Complete	Training was conducted	Implement annual training meetings.	Superintendent of Highways	7/1/2017	Completed 6/26/2018	The annual training was completed during the spring of 2018 by Weston & Sampson.
6-2 Implement MS4 property and operations maintenance	In progress	Review current operation and maintenance procedures. Town parks have pet waste programs and scheduled trash collection. DPW has procedures for vehicle maintenance.	Update and implement MS4 operation and maintenance procedures.	Superintendent of Highways	7/1/2018	Completed 7/1/2018	
6-3 Implement coordination with interconnected MS4s	Not started	This has not been started.	Coordinate with interconnected MS4s.	Superintendent of Highways	Not specified	Not specified	In the future, the Town and DOT will coordinate operations and maintenance procedures.

Table 6.1 Pollution Prevention/ Good Housekeeping BMP (Continued)

BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
6-4 Develop/Implement program to control other sources of pollutants to the MS4	Not started	Develop program to control other sources of pollutants. This has not been started yet.	Develop and implement program to control other sources of pollutants.	Superintendent of Highways	Not specified	Projected 7/1/2020	
6-5 Evaluate additional measures for discharges to impaired waters	Not started	Conduct preventative maintenance and fund retrofits to reduce pollutants to impaired water bodies. This has not been started yet.	Evaluate additional measures for discharges to impaired waters	Superintendent of Highways	Not specified	Projected 7/1/2019	
6-6 Track projects that disconnect DCIA	Ongoing	Track projects that disconnect DCIA.	Report projects that disconnect DCIA in annual reports.	Land Use Administrator, Superintendent of Highways	7/1/2017	Projected 7/1/2020	
6-7 Implement infrastructure repair/ rehab program	Not Started	Repair and rehabilitate the MS4 infrastructure in a timely manner has not been started.	Implement infrastructure repair/ rehab program	Superintendent of Highways	7/1/2021	Projected 7/1/2021	
6-8 Develop/Implement plan to identify/prioritize retrofit projects	Not Started	Develop plan to identify/prioritize retrofit projects has not been started.	Database of identified/prioritized retrofit projects	Superintendent of Highways	7/1/2020	Projected 7/1/2020	
6-9 Implement retrofit projects to disconnect 2% of DCIA	Not Started	Track projects that disconnect DCIA, and include in annual report has not been started.	Implement retrofit projects.	Superintendent of Highways	7/1/2022	Projected 7/1/2022	
6-10 Develop/implement street sweeping program	Complete	All streets were swept after the first snowmelt.	Street sweeps are conducted annually.	Superintendent of Highways	7/1/2017	Completed 7/1/2017	

Table 6.1 Pollution Prevention/ Good Housekeeping BMP (Continued)							
BMP	Status	Activities in current reporting period	Measurable Goal	Responsible Department or Person	Due	Date completed or projected completion date	Additional Details
6-11 Develop/implement catch basin cleaning program	Complete	Continue Catch Basin Maintenance Program.	Catch basins are cleaned in accordance with Program.	Superintendent of Highways	7/1/2020	Completed 7/1/2017	Typically, all catch basins are cleaned between the spring and fall. In 2017, the Town started keeping records of the catch basins that were cleaned.
6-12 Develop/implement snow management practices	Ongoing/ In Progress	Develop and implement standard operating practices for snow management	Implement standard snow management practices.	Superintendent of Highways	7/1/2018	Completed 7/1/2018	The magic salt is stored at the Transfer Station. The handling of the salt is described under the Industrial Permit.

6.2 Pollution Prevention/ Good Housekeeping Activities

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

Continue to conduct Street Sweeping Program, Catch Basin Cleaning Program and standard operating practices for snow management.

Develop list of projects to eliminate DCIA.

Continue following operation and maintenance procedures.

6.3 Pollution Prevention/ Good Housekeeping Reporting Metrics

Table 6.2 Metrics	
Employee training provided for key staff	Yes
Street sweeping	
Curb miles swept	84 miles
Volume (or mass) of material collected	337 Yards
Catch basin cleaning	
Total catch basins in priority areas	Unknown
Total catch basins in MS4	350
Catch basins inspected	350
Catch basins cleaned	350
Volume (or mass) of material removed from all catch basins	225 tons
Volume removed from catch basins to impaired waters (if known)	Unknown
Snow management	
Type(s) of deicing material used	Magic salt
Total amount of each deicing material applied	1000 tons
Type(s) of deicing equipment used	Dump Truck – 4 season body
Lane-miles treated	84 miles
Snow disposal location	Transfer Station
Staff training provided on application methods & equipment	No
Municipal turf management program actions (for permittee properties in basins with N/P impairments)	
Reduction in application of fertilizers (since start of permit)	Unknown
Reduction in turf area (since start of permit)	Unknown
Lands with high potential to contribute bacteria (dog parks, parks with open water, & sites with failing septic systems)	Undetermined
Cost of mitigation actions/retrofits	N/A

6.4 Catch Basin Cleaning Program

Briefly describe the method used to optimize your catch basin inspection and cleaning schedule.

The Town's catch basin maintenance program consists of inspecting and cleaning catch basins on a regularly scheduled basis. The Town uses the following criteria for inspecting and cleaning their catch basins:

- The Town, at a minimum, will annually evaluate and, if necessary, clean catch basins and other stormwater structures that accumulate sediment. Typically, all catch basins in Town are cleaned in the spring and fall each year to prevent having to clean subsurface storm sewer pipe segments between structures.
- Priority areas will be established to maximize the effectiveness of the Town's available resources for the routine inspections. These priority areas will be developed using the town's knowledge of problem areas, where sediment/debris has been known to accumulate in higher quantities. Geographical location, climate, traffic patterns and vertical sag locations may also be factors in determining priority areas.

The Town will evaluate roads in the immediate vicinity of watercourses and waterbodies, and the Town will implement additional catch basin cleanings as needed.

7 MONITORING RESULTS

MS4s that discharge to impaired streams shall be monitored. Screening of outfalls that discharge to impaired waters shall begin within one year of the effective date of the General Permit. For this monitoring period, five outfalls that discharge to the Naugatuck River were analyzed for bacteria. The lab results are included in Appendix B.

According to the 2016 Integrated Water Quality Report, there are three EPA Category 5 impaired waterbody segments in the Town shown below. Category 5 designates a water that is impaired or threatened by a pollutant or pollutants for one or more designated uses and requires a total maximum daily load (TMDL).

- Naugatuck River (6900-00_05)
- Naugatuck River (6900-00_06)
- Branch Brook (6910-00_01)

The Naugatuck River is an impaired water with a TMDL for bacteria. The “Total Maximum Daily Load Analysis for Recreational uses of the Naugatuck River Regional Basin” report was approved by the EPA on June 6, 2008. This segment of Branch Brook does not have an established TMDL, but the segment of the river is not supporting aquatic life due to some pollutant or pollutants.

7.1 Impaired Waters Investigation and Monitoring Program

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

The plan to screen all the outfalls that discharge to impaired waters is shown below. See Figure 2 in Appendix A for a map of the outfall locations. The Integrated Water Quality Report is published every two years. The monitoring schedule will be updated if impaired waters change.

Table 7.1 Stormwater Outfall Monitoring Dates	
Target Date	Measurable Goal/ Activity
Completed 12/21/2018	Screening Outfalls: 84, 85, 138, 139 & 140
July 1, 2019	Screening Outfalls: 21, 22, 23, 24 & 250 Follow up Investigation on outfalls with high pollutant concentrations.
July 1, 2020	Screening Outfalls 4,5,8, 20, 48, Follow up Investigation on outfalls with high pollutant concentrations.
July 1, 2021 July 1, 2022	Annually monitor the six priority outfalls

7.2 Screening Data for Outfalls to Impaired Waterbodies

Complete the table below for any outfalls screened during the reporting period. Each Annual Report will add on to the previous year's screening data showing a cumulative list of outfall screening data.

Outfall ID	Sample date	Parameter (Nitrogen, Phosphorus, Bacteria, or Other pollutant of concern)	E.coli (MPN/100 mls) Limit 410*	Enterococci Bacteria (MPN/100 mls) Limit 500*	T. Coliform (MPN/100 mls) Limit 500*	Name of Laboratory (if used)	Follow-up required?
84	12/21/18	Bacteria	86	985	7700	Phoenix	Yes
85	12/21/18	Bacteria	20	121	1670	Phoenix	Yes
138	12/21/18	Bacteria	754	2280	8160	Phoenix	Yes
139	12/21/18	Bacteria	512	985	13000	Phoenix	Yes
140	12/21/18	Bacteria	110	1500	11200	Phoenix	Yes

*The 2017 General Permit states the maximum allowed levels of pollutants of concern and requires follow-up investigations when parameters are over the maximum allowed.

The five outfalls sampled in 2018 had concentrations of Total Coliform greater than the allowable limit of 500 MPN/100 mls stated in the 2007 General Permit. Follow-up investigations will be conducted on the watersheds contributing to these outfalls.

8 ADDITIONAL IDDE PROGRAM DATA

8.1 Assessment and Priority Ranking of Catchments Data

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

Table 8.1 Catchment Rankings

1. Catchment ID (DEEP Basin ID)	2. Category	3. Rank

8.2 Outfall and Interconnection Screening and Sampling Data

Provide sample data for outfalls where flow is observed. Only include Pollutant of concern data for outfalls that discharge into stormwater impaired waterbodies.

Table 8.2 Dry Weather Screening and Sampling Data from Outfalls and Interconnections										
Outfall / Interconnection ID	Screening / sample date	Ammonia	Chlorine	Conductivity	Salinity	E. coli or enterococcus	Surfactants	Water Temp	Pollutant of concern	If required, follow-up actions taken

Provide sample data for outfalls and key junction manholes of any catchment area with at least one System Vulnerability Factor.

Table 8.3 Wet Weather Sample and Inspection Data									
Outfall / Interconnection ID	Sample date	Ammonia	Chlorine	Conductivity	Salinity	E. coli or Enterococcus	Surfactants	Water Temp	Pollutant of concern

8.3 Catchment Investigation Data

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.

Table 8.4 System Vulnerability Factor Summary		
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).

Table 8.5 Key Junction Manhole Dry Weather Screening and Sampling Data

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

Table 8.6 Wet Weather Investigation Outfall Sampling Data

Outfall ID	Sample date	Ammonia	Chlorine	Surfactants

Table 8.7 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

9 CERTIFICATION AND SIGNATURE

9.1 CERTIFICATION REQUIREMENTS

This plan and any document, including but not limited to any notice, information or report, which is submitted to the Commissioner of the CTDEEP under the General Permit for the Discharge of Stormwater from Small Municipal Separate Storm Sewer Systems shall be signed by the chief elected official or principal executive officer, and by the individual or individuals responsible for preparing such document as defined in Section 22a-430-3(b) (2) of the Regulations of Connecticut State Agencies.

9.2 PLAN CERTIFICATION AND SIGNATURE

"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

Edmond V. Mone
First Selectman
Town of Thomaston, Connecticut

Signature and Date

Document Prepared by

Raju Vasamsetti, P.E.
Project Manager
Weston & Sampson Engineers, Inc.

Signature and Date

APPENDIX A
OUTFALL MAPS

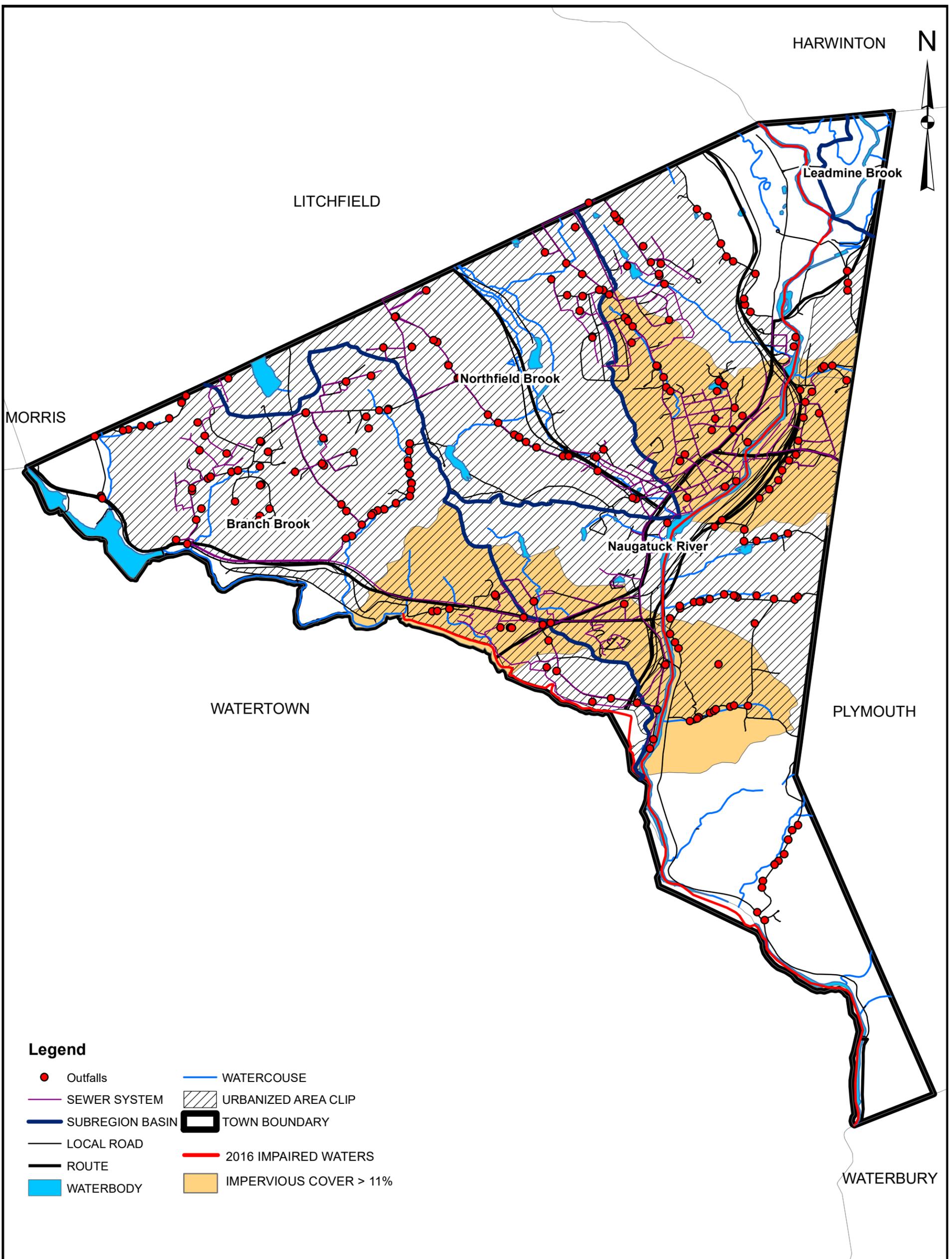


FIGURE 1
PRIORITY AREAS AND STORMWATER OUTFALLS

STORMWATER
ANNUAL REPORT 2018

TOWN OF THOMASTON



0 0.25 0.5 1 1.5 2 Miles

SOURCE: CTDEEP GIS DATA 2014

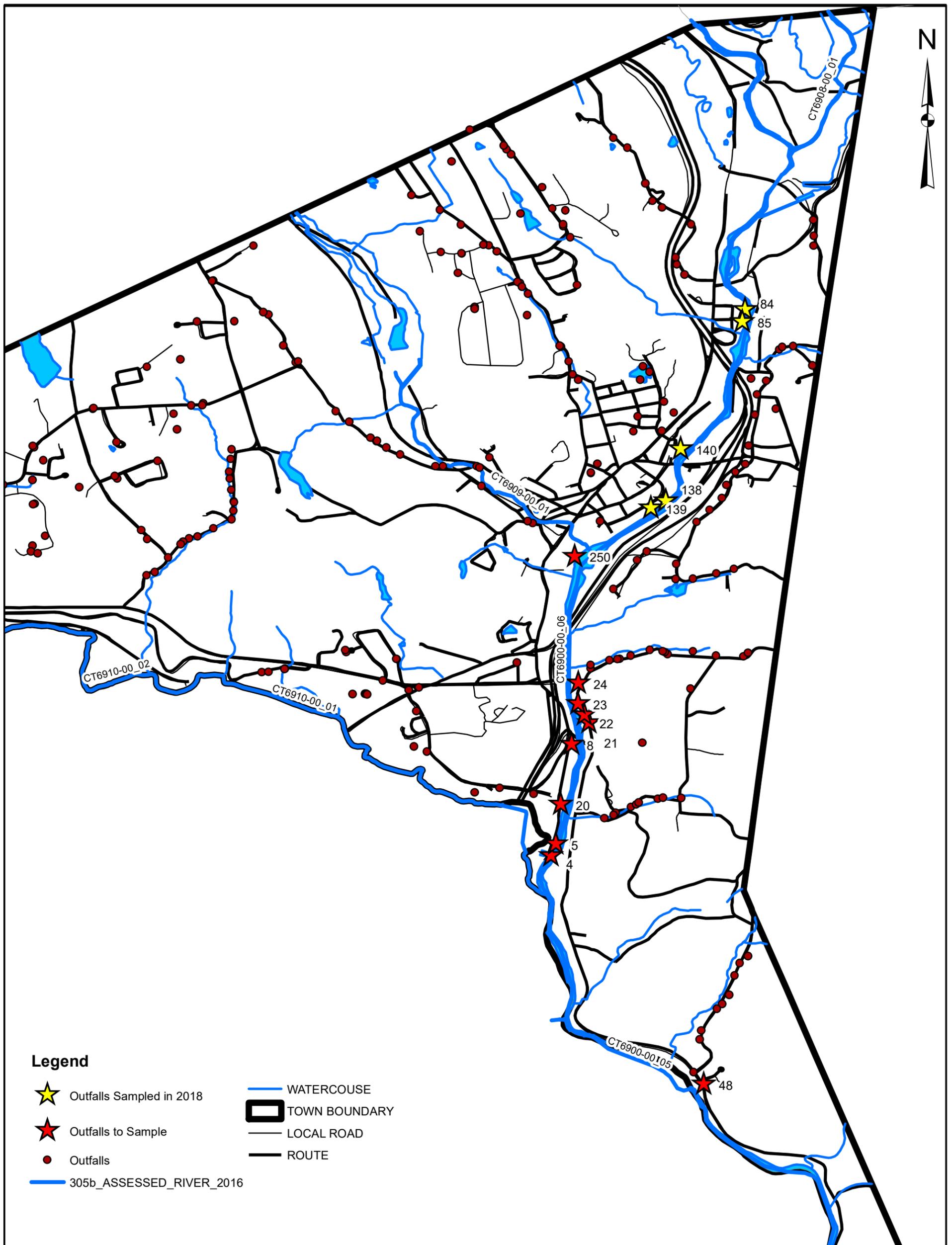


FIGURE 2
OUTFALLS TO SAMPLE

STORMWATER
ANNUAL REPORT
2018

TOWN OF THOMASTON



0 0.125 0.25 0.5 0.75 1 Miles

SOURCE: CTDEEP GIS DATA 2014

APPENDIX B

LAB DATA



Wednesday, December 26, 2018

Attn: Raju Vasamsetti
Weston & Sampson
273 Dividend Rd
Rocky Hill, CT 06067

Project ID: THOMASTON MS4
Sample ID#s: CC18968, CC18968 - CC18969, CC18969 - CC18970, CC18970 - CC18971,
CC18971 - CC18972, CC18972 - CC18973, CC18973

This laboratory is in compliance with the NELAC requirements of procedures used except where indicated.

This report contains results for the parameters tested, under the sampling conditions described on the Chain Of Custody, as received by the laboratory. This report is incomplete unless all pages indicated in the pagination at the bottom of the page are included.

A scanned version of the COC form accompanies the analytical report and is an exact duplicate of the original.

If you have any questions concerning this testing, please do not hesitate to contact Phoenix Client Services at ext. 200.

Sincerely yours,

A handwritten signature in black ink that reads "Phyllis Shiller". The signature is written in a cursive style.

Phyllis/Shiller

Laboratory Director

NELAC - #NY11301
CT Lab Registration #PH-0618
MA Lab Registration #M-CT007
ME Lab Registration #CT-007
NH Lab Registration #213693-A,B

NJ Lab Registration #CT-003
NY Lab Registration #11301
PA Lab Registration #68-03530
RI Lab Registration #63
UT Lab Registration #CT00007
VT Lab Registration #VT11301



Environmental Laboratories, Inc.
 587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
 Tel. (860) 645-1102 Fax (860) 645-0823

Analysis Report
 December 26, 2018

FOR: Attn: Raju Vasamsetti
 Weston & Sampson
 273 Dividend Rd
 Rocky Hill, CT 06067

Sample Information

Matrix: STORM WATER
 Location Code: WESTSAMP-THOM
 Rush Request: Standard
 P.O.#:

Custody Information

Collected by:
 Received by: CP
 Analyzed by: see "By" below

Date

12/21/18
 12/21/18

Time

11:30
 14:32

Laboratory Data

SDG ID: GCC18968
 Phoenix ID: CC18968

Project ID: THOMASTON MS4
 Client ID: 84

Parameter	Result	RL/ PQL	Units	Dilution	Date/Time	By	Reference
Escherichia Coli	86	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SM9223B-04
Enterococci Bacteria	985	10	MPN/100 mls	10	12/21/18 16:00	MLT/RM	Enterolert
Total Coliforms	7700	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SW9223B-06

RL/PQL=Reporting/Practical Quantitation Level ND=Not Detected BRL=Below Reporting Level

Comments:

If there are any questions regarding this data, please call Phoenix Client Services.
 This report must not be reproduced except in full as defined by the attached chain of custody.

Phyllis Shiller, Laboratory Director
 December 26, 2018

Reviewed and Released by: Maryam Taylor, Project Manager



Environmental Laboratories, Inc.
 587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
 Tel. (860) 645-1102 Fax (860) 645-0823

Analysis Report
 December 26, 2018

FOR: Attn: Raju Vasamsetti
 Weston & Sampson
 273 Dividend Rd
 Rocky Hill, CT 06067

Sample Information

Matrix: STORM WATER
 Location Code: WESTSAMP-THOM
 Rush Request: Standard
 P.O.#:

Custody Information

Collected by:
 Received by: CP
 Analyzed by: see "By" below

Date

12/21/18
 12/21/18

Time

11:45
 14:32

Laboratory Data

SDG ID: GCC18968
 Phoenix ID: CC18969

Project ID: THOMASTON MS4
 Client ID: 85

Parameter	Result	RL/ PQL	Units	Dilution	Date/Time	By	Reference
Escherichia Coli	20	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SM9223B-04
Enterococci Bacteria	121	10	MPN/100 mls	10	12/21/18 16:00	MLT/RM	Enterolert
Total Coliforms	1670	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SW9223B-06

RL/PQL=Reporting/Practical Quantitation Level ND=Not Detected BRL=Below Reporting Level

Comments:

If there are any questions regarding this data, please call Phoenix Client Services.
 This report must not be reproduced except in full as defined by the attached chain of custody.

Phyllis Shiller, Laboratory Director
 December 26, 2018

Reviewed and Released by: Maryam Taylor, Project Manager



Environmental Laboratories, Inc.
 587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
 Tel. (860) 645-1102 Fax (860) 645-0823

Analysis Report
 December 26, 2018

FOR: Attn: Raju Vasamsetti
 Weston & Sampson
 273 Dividend Rd
 Rocky Hill, CT 06067

Sample Information

Matrix: STORM WATER
 Location Code: WESTSAMP-THOM
 Rush Request: Standard
 P.O.#:

Custody Information

Collected by:
 Received by: CP
 Analyzed by: see "By" below

Date

12/21/18
 12/21/18

Time

11:45
 14:32

Laboratory Data

SDG ID: GCC18968
 Phoenix ID: CC18970

Project ID: THOMASTON MS4
 Client ID: 140

Parameter	Result	RL/ PQL	Units	Dilution	Date/Time	By	Reference
Escherichia Coli	110	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SM9223B-04
Enterococci Bacteria	1500	10	MPN/100 mls	10	12/21/18 16:00	MLT/RM	Enterolert
Total Coliforms	11200	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SW9223B-06

RL/PQL=Reporting/Practical Quantitation Level ND=Not Detected BRL=Below Reporting Level

Comments:

If there are any questions regarding this data, please call Phoenix Client Services.
 This report must not be reproduced except in full as defined by the attached chain of custody.

Phyllis Shiller, Laboratory Director

December 26, 2018

Reviewed and Released by: Maryam Taylor, Project Manager



Environmental Laboratories, Inc.
 587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
 Tel. (860) 645-1102 Fax (860) 645-0823

Analysis Report
 December 26, 2018

FOR: Attn: Raju Vasamsetti
 Weston & Sampson
 273 Dividend Rd
 Rocky Hill, CT 06067

Sample Information

Matrix: STORM WATER
 Location Code: WESTSAMP-THOM
 Rush Request: Standard
 P.O.#:

Custody Information

Collected by:
 Received by: CP
 Analyzed by: see "By" below

Date

12/21/18
 12/21/18

Time

12:00
 14:32

Laboratory Data

SDG ID: GCC18968
 Phoenix ID: CC18971

Project ID: THOMASTON MS4
 Client ID: 138

Parameter	Result	RL/ PQL	Units	Dilution	Date/Time	By	Reference
Escherichia Coli	754	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SM9223B-04
Enterococci Bacteria	2280	10	MPN/100 mls	10	12/21/18 16:00	MLT/RM	Enterolert
Total Coliforms	8160	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SW9223B-06

RL/PQL=Reporting/Practical Quantitation Level ND=Not Detected BRL=Below Reporting Level

Comments:

If there are any questions regarding this data, please call Phoenix Client Services.
 This report must not be reproduced except in full as defined by the attached chain of custody.

Phyllis Shiller, Laboratory Director
 December 26, 2018

Reviewed and Released by: Maryam Taylor, Project Manager



Environmental Laboratories, Inc.
 587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
 Tel. (860) 645-1102 Fax (860) 645-0823

Analysis Report
 December 26, 2018

FOR: Attn: Raju Vasamsetti
 Weston & Sampson
 273 Dividend Rd
 Rocky Hill, CT 06067

Sample Information

Matrix: STORM WATER
 Location Code: WESTSAMP-THOM
 Rush Request: Standard
 P.O.#:

Custody Information

Collected by:
 Received by: CP
 Analyzed by: see "By" below

Date

12/21/18
 12/21/18

Time

12:30
 14:32

Laboratory Data

SDG ID: GCC18968
 Phoenix ID: CC18972

Project ID: THOMASTON MS4
 Client ID: 139

Parameter	Result	RL/ PQL	Units	Dilution	Date/Time	By	Reference
Escherichia Coli	512	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SM9223B-04
Enterococci Bacteria	985	10	MPN/100 mls	10	12/21/18 16:00	MLT/RM	Enterolert
Total Coliforms	13000	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SW9223B-06

RL/PQL=Reporting/Practical Quantitation Level ND=Not Detected BRL=Below Reporting Level

Comments:

If there are any questions regarding this data, please call Phoenix Client Services.
 This report must not be reproduced except in full as defined by the attached chain of custody.

Phyllis Shiller, Laboratory Director
 December 26, 2018

Reviewed and Released by: Maryam Taylor, Project Manager



Environmental Laboratories, Inc.
 587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
 Tel. (860) 645-1102 Fax (860) 645-0823

Analysis Report
 December 26, 2018

FOR: Attn: Raju Vasamsetti
 Weston & Sampson
 273 Dividend Rd
 Rocky Hill, CT 06067

Sample Information

Matrix: STORM WATER
 Location Code: WESTSAMP-THOM
 Rush Request: Standard
 P.O.#:

Custody Information

Collected by:
 Received by: CP
 Analyzed by: see "By" below

Date

12/21/18
 12/21/18

Time

12:45
 14:32

Laboratory Data

SDG ID: GCC18968
 Phoenix ID: CC18973

Project ID: THOMASTON MS4
 Client ID: 250

Parameter	Result	RL/ PQL	Units	Dilution	Date/Time	By	Reference
Escherichia Coli	31	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SM9223B-04
Enterococci Bacteria	233	10	MPN/100 mls	10	12/21/18 16:00	MLT/RM	Enterolert
Total Coliforms	6870	10	MPN/100 mls	10	12/21/18 16:00	.T/MLT/R\	SW9223B-06

RL/PQL=Reporting/Practical Quantitation Level ND=Not Detected BRL=Below Reporting Level

Comments:

If there are any questions regarding this data, please call Phoenix Client Services.
 This report must not be reproduced except in full as defined by the attached chain of custody.

Phyllis Shiller, Laboratory Director
 December 26, 2018

Reviewed and Released by: Maryam Taylor, Project Manager

Wednesday, December 26, 2018

Criteria: CT: GWP, SWP

State: CT

Sample Criteria Exceedances Report

GCC18968 - WESTSAMP-THOM

SampNo	Acode	Phoenix Analyte	Criteria	Result	RL	Criteria	RL Criteria	Analysis Units
--------	-------	-----------------	----------	--------	----	----------	----------------	-------------------

*** No Data to Display ***

Phoenix Laboratories does not assume responsibility for the data contained in this exceedance report. It is provided as an additional tool to identify requested criteria exceedences. All efforts are made to ensure the accuracy of the data (obtained from appropriate agencies). A lack of exceedence information does not necessarily suggest conformance to the criteria. It is ultimately the site professional's responsibility to determine appropriate compliance.



Environmental Laboratories, Inc.
587 East Middle Turnpike, P.O.Box 370, Manchester, CT 06045
Tel. (860) 645-1102 Fax (860) 645-0823



Analysis Comments

December 26, 2018

SDG I.D.: GCC18968

The following analysis comments are made regarding exceptions to criteria not already noted in the Analysis Report or QA/QC Report: None.

CHAIN OF CUSTODY RECORD



587 East Middle Turnpike, P.O. Box 370, Manchester, CT 06040
 Email: info@phoenixlabs.com Fax (860) 645-0823
 Client Services (860) 645-8726

Cooler: Yes No
 Coolant: IPK ICE

Temp °C Pg of

Data Delivery/Contact Options:

Fax:
 Phone:
 Email:

Project P.O.:

Project: THOMASTON MS4
 Report to: BASU VASAMSETTI
 Invoice to: ED MONE - TOWN OF THOMASTON
 QUOTE #

Customer: WESTON & SAMPSON
 Address: 243 ONIDEND RD
ROCKY HILL, CT 06067

Client Sample - Information - Identification

Sampler's Signature: [Signature] Date: 12-21-18

Matrix Code:
 DW=Drinking Water GW=Ground Water SW=Surface Water WW=Waste Water
 RW=Raw Water SE=Sediment SL=Sludge S=Soil SD=Solid W=Wipe Oil=Oil
 B=Bulk L=Liquid X = (Other)

Analysis Request

E. COLI
ENTEROCOCCUS

PHOENIX USE ONLY SAMPLE #	Customer Sample Identification	Sample Matrix	Date Sampled	Time Sampled	Analysis Request	GL Amber 8 w/HP04	GL Soil container () or	40 ml VOA Vial () or	GL Amber 1000ml () as is () HCl	PL H2SO4 () 250ml () 1500ml () 1000ml	PL HNO3 250ml	GL Amber Bottle with
18968	84	SW	12-21-18	1130	X							Z
18969	85			1145	X							Z
18970	140			1145	X							Z
18971	138			1206	X							Z
18972	139			1230	X							Z
18973	250			1245	X							Z

Relinquished by: [Signature] Accepted by: [Signature] Date: 12/21/18 Time: 14:32

RI Direct Exposure (Residential) GW Other

CT RCP Cert GW Protection SW Protection GA Mobility GB Mobility Residential DEC I/C DEC Other

MA MCP Certification GW-1 GW-2 GW-3 S-1 GW-1 S-1 GW-2 S-1 GW-3 S-2 GW-1 S-2 GW-2 S-2 GW-3 S-3 GW-1 S-3 GW-2 S-3 GW-3 MWRA eSMART Other

Data Format: Excel PDF GIS/Key EQUIS Other

Data Package: Tier II Checklist Full Data Package* Phoenix Std Report Other

State where samples were collected: * SURCHARGE APPLIES

Turnaround Time: 1 Day* 2 Days* 3 Days* Standard Other * SURCHARGE APPLIES

Comments, Special Requirements or Regulations:
BILL TOWN OF THOMASTON
VIA CT DAS CONTACT.
cp. ED MONE FIRST SPECTMAN