

Town of Plainville
Discharge of Stormwater for Small
Municipal Separated Storm Sewer Systems
(MS4)
Permit Number GSM 000004
Annual Report
2017

April 1, 2018 Due Date

May 7, 2018 Actual Submission Date

Revised to Address CTDEEP's 2017 Annual Report Critique (February 9, 2018)

Revised Draft Posted for Comments March 22, 2018

Minimum Control Measures

Public Education and Outreach

Educational and outreach efforts provide a greater understanding of the importance of the impacts of improper use and disposal practices. Informed and knowledgeable citizens have a greater understanding and appreciation of how their actions impact the environment. This understanding and acceptance is essential to gain the public's interest, confidence and support to modify society's habits regarding their actions and how they impact the environment. Greater acceptance of greener practices is a byproduct of awareness how individual actions impact the environment.

The Town has undertaken various initiatives to develop and distribute materials. Various departments, commissions and agencies have worked together to dispense relevant information pertaining to greener practices. Universal brochures and fact sheets have been reviewed with governing land use commissions. The results of these reviews have generated modifications to regulations and ordinances and continually generate new review standards. Additionally, the Town supports groups and or individuals to organize efforts that address specific causes which directly or indirectly impact the environment and stormwater.

The measurable results of the Public Education and Outreach of the Stormwater Management Plan are as follows:

The Planning and Zoning Commission periodically reviews their Master Plan for Development and Conservation in part to ensure the Town's long term goals are consistent with sound environmental practices. Modifications are adopted as warranted. During the 2017 calendar year no modifications were made related to environmental concerns. A copy of the Master Plan for Development and Conservation is posted on the Town's web site. The Planning and Zoning Commission during the 2018 calendar year will initiate a comprehensive review of the 2009 Master Plan for Development and Conservation. It is anticipated an updated Master Plan for Development and Conservation will be adopted by December 2019. The public will be provided an opportunity to suggest modifications during the review of the existing plan and authoring of any plan text modifications. Public Hearings on the Master Plan for Development and Conservation will be conducted before the review begins and when the draft plan is complete. It is likely other opportunities for public comment will be provided when topics of concern are noted. Environmental concerns related to low impact development and aquifer protection will be considered during the review and debate regarding the policies and goals adopted for future land use.

The Planning and Zoning Commission reviews all land use applications to determine consistency with the "Plainville Low Impact Development and Storm Water Management Design Manual". Certain application types trigger automatic Public Hearings offering an opportunity for the public to comment. Development plans are often modified based on staff or public comments to address issues regarding stormwater management. Additionally, Town staff regularly reviews with the Commission innovative techniques being developed and implemented. Revisions to the Low Impact Development Guidance Document were made to clarify and identify water quality standards. A copy of "Plainville Low Impact Development and Stormwater Management Design Manual" is posted on the Town's web site.

The Planning and Zoning Regulations are periodically reviewed to encourage "Smart Development Techniques". All changes to the regulations require a public hearing. Proposed changes may be suggested by the public. The Planning and Zoning Regulations are posted on the Town's web site.

The Town's Catch Basins were stenciled reminding individuals that dumping into the catch basins creates pollution and will be harmful to the environment. The Town's Roadway Division maintains the stenciled markings when the catch basins are cleaned.

The Town through the Water Pollution Control Division and the Plainville Southington Health District continue the implementation of a program to inform grease generators to the importance of properly addressing grease byproducts consistent with DEP's FOG Regulations. New and problematic establishments are required to upgrade their collection systems for grease byproducts. Permits applications include documents explaining the FOG Regulations.

Continued discussions with commercial vehicle operators on the importance of promptly addressing spilled vehicle fluids. These discussions generally involve interaction between Town inspectors and a specific operator. The fire department responds to any reported vehicle fluid spills and seeks DEEP's assistance when appropriate.

Provided instruction and advice to developers/builders regarding the importance of properly installing and maintaining erosion control devices. Most developments require periodical inspections by Town staff beginning with a preconstruction inspection. During the past calendar year there were no large scale residential developments. Inspections were completed at more than ten commercial/industrial developments.

Past monitoring results indicate that improper pest waste disposal is problematic especially in residential areas. Principles why the proper management of pet wastes are important were conveyed when appropriate during the public's interaction with the Animal Control Officer. Additionally, in park areas regularly frequented by pets and their owners, waste receptacles are provided with detailed instructions.

The staff of the Engineering Department is available to assist and or research topics of concern related to stormwater for the Town Council, Town Agencies and residents. To date, the general population has expressed little interest in stormwater matters.

During the 2018 calendar year, the Town of Plainville will continue to provide public education and outreach as warranted in conformance with the Stormwater Management Plan. Efforts will be made to provide services that would better inform the public. It is proposed that an increase emphasis will be placed on bolstering the availability of educational materials. Inquiries will be addressed as warranted. The Town of Plainville in the upcoming calendar year will continue to address the public's need to be inform of pertinent stormwater management matters.

Target Year	Activity	Responsible Department
December 2017 Yearly Review	Update Prepared Brochures and Fact Sheets – Tailored to targeted Pollutants of Concern (BMP ID # 1-1A)	Technical Services – Ongoing Yearly review was completed – Goals for 2018 – bolster availability of brochures and fact sheets
Ongoing Yearly Review	Create Brochures and Fact Sheets specific to Plainville if necessary (BMP ID # 1-1B)	Technical Services
Ongoing Yearly Review	Stormwater Facilities and Install Tributary Signage (BMP ID #1-1C)	Technical Services – Ongoing – Action taken during the 2017 calendar Year was the continued stenciling of catch basins which will continue in 2018
Ongoing Yearly Review	Compile and Distribute listing of Web Sites (BMP ID #1-1D)	Technical Services – Ongoing no action taken during the 2017

		calendar year – Goal for 2018 to update and bolster listings
Ongoing Yearly Review	Coordinate and Publicizing pertinent activities (BMP ID # 1-1E)	Technical Services – Ongoing – Goal for 2018 to increase interest in Stormwater matters – Importance of handling pet wastes appropriately
Ongoing Yearly Review	Prepare and distribute brochures and or fact sheets for target groups (BMP ID #1-1F)	Technical Services – No Action taken IN 2018 web page to be bolstered to include additional information
December 2017	Reconcile/Revise Town Ordinances and or regulations to be consistent with stormwater plan (BMP ID #1-1G)	Technical Services - Town Ordinances/Regulations under review – Goal for 2018 Completion of review/Reconcile/adoption target date December 2018
Ongoing Yearly Review	Enforce the appropriate ordinances and regulations ensuring compliance with the Stormwater Plan (BMP ID #1-1H)	Technical Services Various Enforcement Agents – Action taken as warranted
Ongoing Yearly Review	Distribute of Educational Materials (BMP ID #1-2A)	Technical Services – No action taken – Goal for 2018 bolster efforts
December 2019	Address educational outreach for pollutants of concern (BMP ID #1-2B)	Technical Services – Goal for 2018 Emphasis on Pet Waste

Minimum Control Measure

Public Involvement and Participation

Public involvement and participation is essential in the development and implementation of the stormwater management plan. As the community becomes more actively engaged, the program should evolve into the community's policies and practices rather than mandates forced upon the community by others. Greater acceptance of greener practices is a byproduct of awareness how an individual's action impacts the surrounding world.

The measurable results of the Public Involvement and Participation elements of the Stormwater Management Plan are as follows:

During the 2017 calendar year, the Town continued the practices and policies governing public involvement and participation elements of the Stormwater Management Plan as describe below. The Town has undertaken various initiatives to develop and continue the distribution of

educational opportunities. Various departments, commissions and agencies have worked together to dispense relevant information pertaining to greener practices.

As an example: During the 2017 calendar year, the Planning and Zoning Commission conducted Public Hearings to consider revisions to their regulations. The adoption procedures involve public information sessions including opportunities for the public to present and voice facts and opinions. Special attention was given to include organizations and individuals who had a desire to contribute to the development and implementation of the revisions. Additionally, efforts were made to reach out and include the expertise of as many individuals and special interest groups that expressed interest in contributing to the effort.

Local Boards and Commissions have authority including the following duties: the operation and maintenance of the infrastructure, jurisdiction related to land use practices, enforcement of soil erosion control, operation of parks and recreation activities and other institutional operators have offered and continue to be afforded the opportunity to contribute toward efforts to properly manage water resources. Local Boards and Commissions including elected officials, decision makers, Town Department Heads, Economic Development Agency, Operational Staff and citizens contributed to the effort to develop and implement the Stormwater Management Plan. Public Informational Meetings were held to address water quality issues at Paderewski Park Pond. The outcome was the establishment of a group called Friends of Paderewski Park Pond. The goal of this group is to monitor and advise Town policy makers on the health of the pond. The group has met regularly and is currently coordinating efforts to develop policies and practices which are intended to preserve the ecological features of an urban pond. Additional undertakings have been proactive actions to enhance the water quality of the pond as deemed appropriate, provided operational advice to improve maintenance practices which may impact the pond. One accomplishment of the Friends of Paderewski Park was to commission a study to determine the general health of the resource. The findings of this study were presented to the Town Council and Conservation Commission. The public had an opportunity to comment on the findings.

Other groups such as State Agencies, Environmental Groups, Trade Organizations, private individuals, (Developers, Facility Owners, Environmental Activists, Educators, and Neighborhood Leaders), were invited to attend informational meetings as warranted. During the review of a proposed Multi-use path various individuals interested in environmental concerns were afforded the opportunity to participate in the development of a route consistent with sound environmental practices.

Local support of the Stormwater Management Plan has involved efforts by various groups to clean-up the community, change the public's attitudes and modify the public's practices regarding environmental issues. (I.e. River Clean-ups, Plainville Freedom Lawn Initiative and support of Capital Upgrades to Town Facilities, Conservation Subcommittee Friends of Paderewski Park Pond).

The Stormwater Management Plan and Annual Reports are available for public review on the Town's Web site and in the Engineering Department. The Annual Report will be "Spotlighted" on the Town's Home Page for several weeks after its posting.

During the 2018 calendar year, the Town of Plainville will continue to maintain practices, policies and regulations that are consistent with the Storm water Management Plan.

Ongoing April 2017	Comply with State and Local Public Notice and Freedom of Information Requirements (BMP ID #2-1A)	Town Clerk Technical Services – Completed – No FOI Requests Received – Pertinent documents made available for review on the Town’s Web Site and at the Engineer’s Office – Goal for 2018 Post pertinent materials on Town’s Web Site
Ongoing	Identify Stakeholders (BMP ID #2-2A)	Technical Services – Ongoing Specific to action or project – Input from interested individuals and groups considered prior to actions
Ongoing	Contact stakeholder groups (BMP ID #2-2B)	Technical Services – Ongoing Specific to action or project – Goal for 2018 maintain dialog with Wetlands, Planning/Zoning and Conservation
Ongoing	Conduct informational meeting with various stakeholder groups (BMP ID #2-2C)	Technical Services – None Required – Groups involvement Included in the normal process
Ongoing	Support Community Clean-ups (BMP ID #2-3A)	Technical Services Physical Services Conservation Commission – Town wide Spring Clean-up 2017 – Goal for 2018 maintain support of Town wide Spring Clean-up
Ongoing	Support existing Boards and Commissions referring interested individuals to the appropriate group (BMP ID #2-4A)	Technical Services Various Commissions/Boards Town Manager Town Council – Support provided as warranted – Public Projects and Private Development
Ongoing	Support existing Boards and Commissions referring interested individuals to the appropriate group (BMP ID #2-4B)	Technical Services Various Commissions/Boards Town Manager Town Council – support provided as warranted – private development proposals and public projects
Ongoing	Encourage citizens to aid in the identification of polluters (BMP ID #2-4C)	Technical Services Town Manager Town Council – Out reach provided

MINIMUM CONTROL MEASURE

ILLICIT DISCHARGE DETECTION AND ELIMINATION

Illicit discharge identification and elimination represents an important element of preventing and eliminating the harmful impacts of point source pollutants. The Stormwater Management Plan addresses the potential adverse effects of illicit discharges on the environment. Illicit discharges are defined as non-storm flows from connection from washing machines, dishwasher or sinks, paint, cleaners or chemicals, overflowing sanitary sewers, Leaking septic tanks and failing septic fields, oil, gas and car fluids, cooking oil and grease and litter and legal dumping. Discharges DEEP considers exceptions to illicit discharges are water line flushing, landscaping irrigation overflow, diverted stream flows, uncontaminated ground water infiltration, uncontaminated pumped ground water, discharges from potable water sources, foundation drains, air conditioning condensation, springs, water sump pumps, footing drains, lawn watering, individual residential car washing, dechlorinated swimming pool discharge and firefighting activities.

The measurable results of the Illicit Discharge Detection and Elimination elements of the Stormwater Permit are as follows:

The Town of Plainville reviewed, maintained and revised accordingly the Master Drainage Utility Maps to identify each discharge and associated watershed. Additionally, each discharge has been field located by coordinates, photographed, numbered, logged and inspected. The inspection notes include recommendations to the Roadway Department to incorporate improvements and a maintenance schedule. A systematic reinspection of a portion of the discharges approximately 50% was completed during 2017. The goal is to reinspect each discharge once every five years.

Field personnel were briefed on the identification of illicit discharges and their potential adverse effects. Periodic discussions with staff were conducted to introduce new topics or retrain employees.

Plainville's urban setting and preexisting dense development make it extremely difficult to eliminate entirely all connections to the public drainage. The definition of allowed or exempt illicit discharges as provided by DEEP's critique of the 2016 Annual Report and EPA's Model Ordinance doesn't address interior footing drains. The open sump pit can also function as a floor drain. It is unlikely such circumstances/discharges could unilaterally be defined as uncontaminated ground water discharges. The established permit system would appear to be a more practical solution to address the need to restrict illicit discharges and inventory discharge locations than the adoption of an Ordinance in the format present is EPA's Model Ordinance.

Property Owners are required to secure a permit from the Engineering Department before any connection to the drainage system is granted. The application process requires a description of

the type of discharge, estimated volume, construction methods and construction plan. All connections are inspected during the installation. Connections discovered complete without a permit are permitted after the fact or removed whether by the Town or property owner. No permits were issued during the 2017 calendar year nor were there any location discovered that connected without a permit.

The Town has worked diligently with its residents and staff to report evidence of pollution, trace the pollution to its source, enforce the appropriate rules or regulation and eliminate the source of the contaminates.

Educational materials were made available to business owners and the general community outlining the permit system and reasons why the elimination of illicit discharges is important.

Goals achieved during the duration of the permit and the 2017 calendar year were the establishment of a Permit System to regulate discharges within the Town of Plainville. This Permit System is believed to be equivalent to an Ordinance and thus fulfills the MS4 Permit requirements. Illicit discharges have been defined and forbidden.

During the 2018 calendar year, the Town of Plainville will continue to maintain practices, policies and regulations that are consistent with the Storm water Management Plan. The inspection of drainage outlets will continue until completion.

Additionally, the Engineering Department will author an ordinance using the model ordinance drafted by EPA Illicit Discharge and Connection Stormwater as directed in DEEP's critique of the 2017 Annual Report from Ms. Kim Hudak dated February 9, 2018. The IDDE program will be reviewed and modified to be consistent or (more consistent) with the standards set forth by the current MS4 permit including the establishment of the definition of an illicit discharge and legal authority to prohibit/control them.

Target Year	Activity	Responsible Department
June 2018	Develop a Written IDDE Program (BMP ID #3-1A)	Technical Services – Completion Target Date October 2018
Ongoing	Revise Master Drainage Maps (BMP ID #3-2A)	Technical Services – Review Completed – Revisions Completed – Goal maintain master maps as warranted
Ongoing	Inspect Drainage Outlets (BMP ID #3-2B) water	Technical Services – 149 of 261 outlets inspected during calendar year 2017 – Goal for 2018 complete inspection of all outlets
Ongoing	Develop Citizen Reporting Program (BMP ID #3-3A)	Technical Services – completed – Annual Review completed – Goal for 2018 – maintain or modify as warranted the reporting program
Ongoing	Review Existing Ordinance and Regulations (BMP ID #3.4A)	Technical Services – Currently under review – Goal for 2018 Establish

		Ordinance Illicit Discharges –EPA Model Ordinance
June 2020	Begin to systematically elimination of illicit discharges (BMP ID #3-6B)	Technical Services Physical Services
January 2020	Draft Ordinance to Establish legal authority to prohibit illicit discharges (BMP ID #3.4B)	Technical Services Town Attorney Town Manager Town Council – Established a Permit System to identify and control discharges – complete – Goal for 2018 adopt Ordinance
June 2018	Develop record keeping system for IDDE tracking (BMP ID 3.5A)	Technical Services – Goal for 2018 establish record keeping system
June 2019	Identify and prioritize categories of non-stormwater discharge (BMP ID #3-6A)	Technical Services Physical Services

Minimum Control Measure

Construction Site Runoff Control

Construction activities by their nature have the potential to create circumstances that generate unintended adverse impacts to the environment. The Town has developed and implemented various practices and procedures consistent with generally accepted BMPs to minimize these impacts.

The measurable results of the Construction Site Runoff Control elements of the Stormwater Permit are as follows:

The Planning and Zoning Commission has developed practices that increase the number of redundant measures required to control the impacts of construction activities. Erosion and Sediment Control measures and proper storage and use of construction chemicals and products are addressed in the current revised regulations and standard practices. The practice of closely reviewing the Erosion Control Plan and construction sequences of projects is seen as a critical element of the application process by the Planning and Zoning Commission. The Commission has directed staff to concentrate efforts on patterned problematic issues such as equipment maintenance and refueling and water way protection. Review considerations and inspection practices are consistent with the guidelines set forth in Connecticut Guidelines for Soil Erosion and Sediment Control dated 2002.

Other agencies such as the Wetland and Conservation Commission are consulted as warranted and have presented review comments which have assisted staff and the Planning and Zoning Commission in making prudent decisions regarding the protection of the environment.

An example of the increased redundancies, revised regulations and standard practices supported by the Town's land use Commissions are requirements in the erosion control regulation to install silt fences back-upped by hay bales. Additionally, runoff from construction sites must pass through a detention area before discharging off site.

A routine requirement of land use approvals is to require inspections before construction activities begin. Additional inspections occur as part of other inspections. Availability of staff precludes periodical routine inspections specifically for construction site runoff control on most projects; however, special attention is given to sites where past problems have occurred or a special concern was noted. Inspection notes are generated summarizing the current conditions, observed circumstances which present problems, conversations with responsible parties, instructions and enforcement actions.

Enforcement actions have been standardized to include the following procedure: The owner/responsible party is immediately notified verbally, a written order is issued and delivered, remediation plan is ordered, developed and implemented for immediate and long term solutions, and follow-up inspections occur until the problem and damage is resolved.

The public is encourage to offer comments during the review period. Plans are available for review in the Planning Office or with the Department of Technical Services. Oral and/or written comments are accepted by staff and the Commissions. Under certain circumstances, public hearings afford the public an opportunity to directly address the Commissions. Additionally, the public is encourage to report any circumstance resulting from construction activities that they believe is a hazard to the environment. Each inquiry is investigated and appropriate action is taken.

Actions undertaken include inspection and enforcement construction activities, receipt of public comments related to construction activities and reconsideration of practice and regulations regarding the control of runoff from construction activities.

During the 2018 calendar year, the Town of Plainville will continue to maintain practices, policies and regulations that are consistent with the Storm water Management Plan. Additionally, the Engineering Department will review the standards and recommended practices and adopt prudent modifications if warranted.

Target Year	Activity	Responsible Department
Ongoing Yearly Review	Review and Reconcile existing Town Ordinance "An Ordinance Establishing The Plainville Soil Erosion and Sediment Control Regulations (BMP ID #4-1A)	Technical Services Town Attorney Town Manager Town Council Completed – Goal for 2018 – Maintain Regulations with current standards

Ongoing Yearly Review	Review and Reconcile Planning and Zoning Regulations with Stormwater Plan (BMP ID #4-1B)	Technical Services Town Planner Planning and Zoning Commission – Goal for 2018 – consider Stormwater Plan during the review of the Master Plan of Conservation and development
Ongoing Yearly Review	Review and Reconcile Inland Wetland Regulations with Stormwater Plan (BMP ID #4-1C)	Technical Services Town Planner Inland Wetland Commission- Complete – Goal for 2018 maintain regulations to current standards
Ongoing Yearly Review	Examine and refine review procedures Private development (BMP ID #4-2A)	Technical Services Town Planner – Complete – Goal for 2018 maintain procedures to current standards
Ongoing Yearly Review	Examine and refine review procedures public construction (BMP ID #4-2B)	Technical Services Town Planner – Complete – Goal for 2018 maintain procedures to current standards
Ongoing Yearly Review	Develop a plan and procedures for interdepartmental review coordination (BMP ID #4-2C)	Technical Services Town Planner – Complete – Goal for 2018 fully implement computer permit system
Ongoing Yearly Review	Review and refine inspection and enforcement procedures (BMP ID #4-3A)	Technical Services Town Planner – Complete- Goal for 2018 maintain practices and update when warranted
Ongoing Yearly Review	Identify priority criteria for site inspection and enforcement (BMP ID #4-3B)	Technical Services Town Planner – Complete – Goal for 2018 maintain practice and update when warranted
Ongoing Yearly Review	Develop formal inspection schedule (BMP ID #4-3C)	Technical Services Town Planner – complete – Goal for 2018 maintain practices and update when warranted
Ongoing	Conduct Site Inspections (BMP ID #4-4)	Technical Services Town Planner – Goal for 2018 conduct inspection as warranted
Ongoing Yearly Review	Develop procedure for Public Comments for construction activities (BMP ID #4-5A)	Technical Services Town Planner – Complete – Goal for 2018 maintain practices and update when warranted

Ongoing Yearly Review	Develop procedures for tracking public comments inquires and associated actions (BMP ID #4-5B)	Technical Services Town Planner – Complete – Goal for 2018 maintain and or modify procedures as warranted
July 2017	Implement procedure to notify Developers about DEEP Construction Stormwater Permit	Technical Services Town Planner - Complete – Goal for 2018 maintain and or modify notification procedure

Minimum Control Measures

Post Construction Runoff Control

Regulations and Ordinances were initiated to develop practices which govern the amount and quality of storm water discharges from developed projects. These regulations and ordinances are generally summarized in the Town's "Low Impact Development and Stormwater Design Manual" including low impact development principals. All new developments or redevelopments implement elements that reduce the volume of runoff and enhance the quality of runoff. Developer proposals are required to provide calculations and evidence that demonstrates the principals and objectives of the "Low Impact Development and Stormwater Design Manual" are achieved. Additionally Town staff performs inspections as warranted post construction to ensure the objectives were achieved and maintained.

The measurable results of the Post Construction Runoff Control elements of the Stormwater Permit are as follows:

During the 2018 calendar year, the Town of Plainville will continue to maintain practices, policies and regulations that are consistent with the Storm water Management Plan. Additionally, the Engineering Department will review the standards and recommended practices of the new MS4 permit requirements and modified the Post Construction Runoff Control goals and objectives as warranted.

Target Year	Activity	Responsible Department
Ongoing Yearly Review	Review and Reconcile existing Town Ordinance "An Ordinance Establishing The Plainville Soil Erosion and Sediment Control Regulations (BMP ID #4-1A)	Technical Services Town Attorney Town Manager Town Council - Complete – Goal for 2018 maintain and or modify as warranted
Ongoing Yearly Review	Review and Reconcile Planning and Zoning Regulations with Stormwater Plan (BMP ID #4-1B)	Technical Services Town Planner Planning and Zoning Commission

		Regulation Review Completed – Goal for 2018 incorporate consideration of the Stormwater Management Requirements into the review of Master Plan
Ongoing Yearly Review	Review and Reconcile Inland Wetland Regulations with Stormwater Plan (BMP ID #4-1C)	Technical Services Town Planner Inland Wetland Commission – Completed – Town Wetland Regulation consistent with DEEP’s model regulations – modify if warranted
Ongoing Yearly Review	Examine and refine review procedures Private development (BMP ID #4-2A)	Technical Services Town Planner – Completed during the 2017 calendar year – Goal for 2018 modify if warranted
Ongoing Yearly Review	Examine and refine review procedures public construction (BMP ID #4-2B)	Technical Services Town Planner – Completed during the 2017 calendar year – Goal for 2018 modify if warranted
Ongoing Yearly Review	Develop a plan and procedures for interdepartmental review coordination (BMP ID #4-2C)	Technical Services Town Planner – completed during the 2017 calendar year – Goal for 2018 modify if warranted
Ongoing Yearly Review	Review and refine inspection and enforcement procedures (BMP ID #4-3A)	Technical Services Town Planner – completed during the 2017 calendar year – Goal for 2018 modify if warranted
Ongoing Yearly Review	Identify priority criteria for site inspection and enforcement (BMP ID #4-3B)	Technical Services Town Planner –completed during the 2017 calendar year – Goal for 2018 modify if warranted
Ongoing Yearly Review	Develop formal inspection schedule (BMP ID #4-3C)	Technical Services Town Planner – completed during the 2017 calendar year – Goal for 2018 modify if warranted
Ongoing Yearly Review	Conduct Site Inspections (BMP ID #4-4)	Technical Services

the drainage system and ultimately into the receiving water. Operations such as street sweeping and catch basin cleaning can be completed in a more timely fashion after the snowmelt because the volume of material needing to be collected is vastly less.

Modifications to fleet maintenance practices include inspections of vehicles for fluid leaks. These routine inspections are completed during periodical scheduled maintenance. Drivers have been instructed to look out for fluid spots when moving the vehicle from their overnight parking spaces and report them to the fleet maintenance division. Fleet maintenance practices have been modified to recycle materials when appropriate. Additionally, all maintenance functions are completed inside the garage. Modified practices have also included the use of less toxic fluids when practical.

Building maintenance practices have been changed to avoid the use of toxic materials. Additionally, control structures such as grease traps and grit separators have been installed to avoid the introduction of floatable and/or settleable materials. These control structures are routinely inspected and cleaned when warranted.

Landscaping practices are reviewed to determine the appropriate applications of fertilizers and pesticides. The Town has adopted management practices to apply nutrients and pesticides at the appropriate times and amounts, Integrated Nutrient and Pesticide Management Program. Additionally, fertilizer and pesticide applications have been eliminated at certain sensitive locations as deemed appropriate.

Storm water drainage structures at each facility are managed in a similar manner as drainage structures located on the roadways. Structures are regularly inspected and cleaned when warranted. Materials removed from the structures are disposed of in an appropriate manner. The structures are cleaned of debris twice a year, (spring and fall).

A program was developed to sweep all streets at least once a year as soon as possible after snowmelt. Additionally, a program was developed and implemented to inspect areas known to require more sweeping. These areas are swept more periodically, as warranted. A sand/salt deicing mixture has been replaced with an all salt practice, thus, vastly reducing the volume of grit on the roadways which could discharge into the waterways. Each street and public parking area was swept in the spring.

A program was developed, instituted and reviewed periodically to ensure each catch basin and outlet is inspected in a timely manner depending upon historical records of past problems. Catch basins/sumps are cleaned generally once every other year. Catch basins known to collect large volumes of debris are cleaned yearly or more frequently as required. Drainage outlets are repaired and cleaned as warranted based on inspections and a priority system. Each catch basin was inspected and cleaned as warranted.

During the 2018 calendar year, the Town of Plainville intends to continue practices and policies which are consistent with best management practices avoiding the introduction of pollutant to storm water consistent with the guidelines of the MS4 permit. Additionally, the Engineering Department will review the standards and recommended practices of the new MS4 permit requirements and modified the Pollution Prevention/ Good Housekeeping goals and objectives as warranted.

Target Year	Activity	Responsible Department
Ongoing Yearly Review	Municipal Employee Training and Awareness (BMP ID #6-1)	Public Works – Roadway, Building and Grounds Water Pollution Control – Training Completed by Operational supervisors – Goal for 2018 provide annual training
Ongoing Yearly Review	Develop and Implement BMPs for Facility maintenance and practices (BMP ID #6-2)	Public Works – Roadway, Building and Grounds Water Pollution Control – Completed - Goal for 2018 Operational practices reviewed and modified as warranted
January 2020	Implement coordination with other interconnect MS4s (BMP ID #6-3)	Technical Services
Ongoing Yearly Review	Develop/implement program to control other sources of pollutants to MS4s (BMP ID #6.4A)	Technical Services Public Works – Operational practices reviewed and modified as warranted
Ongoing Yearly Review	Review of Practices, Methods, and Materials (BMP ID #6-4B)	Technical Services Public Works – Review Completed – Goal for 2018 review and update as warranted
January 2019	Evaluate additional measures for discharges to impaired waters (BMP ID #6.5)	Technical Services
January 2020	Track projects that disconnect DCIA (BMP ID #6.6)	Technical Services
Ongoing Yearly Review	Develop program to evaluate and prioritize system for upgrade and or repair (BMP ID #6-7)	Technical Services Public Works – Approximately 50% of drainage system inspection and repairs prioritized – Goal for 2018 complete

		inspections and prioritize repair goals
January 2020	Develop/implement plan to identify/prioritize retrofit projects to disconnect DCIA – Goal 2% per year (BMP ID #6-8)	Technical Services
Ongoing Yearly Function	Develop/implement street sweeping program (BMP ID #6-9)	Public Works – Roadways – All streets swept spring of 2017 – Goal for 2018 – Sweep all Streets in spring 2018

Screening/Monitoring

The monitoring requirements of the MS4 permit program beginning July 1, 2017 consists of the following elements: Impaired Waters Outfall Investigation and Monitoring, Dry Weather Baseline Outfall/Interconnection Screening and Sampling, Wet Weather Outfall Sampling and Follow-up Screening.

Impaired Waters Outfall Investigation and Monitoring

The Town discharges to the following impaired waters:

- Quinnipiac River – Queen Street to Hamlin Pond – PCBs and E-coli – Catchment Area #1
- Pequabuck River – Route 72 to the Bristol City Line – E-coli – Catch Area #2

Outlets discharging into these areas need to be screened for the pollutant identified as the pollutant of concern for the impairment. A review of the Master Drainage maps indicates 44 outfalls discharge directly into impaired waters.

Bacteria shall be sampled in accordance with the wet weather criteria: E-coli and Total Coliform (col/100ml). Further investigation needs to identify the source should the sampling exceed the following limits: E-coli > 410 Col/100 ml (non –swimming Area and/or Total Coliform > 500 col/100ml in any area. Any outlet discharges exceeding the limits shall be investigated to determine the source of the bacteria. When the source of the bacteria is determined, a remediation plan needs to be implemented. Should the source be determined to be natural no remediation is required. Natural sources are wildlife or runoff from undeveloped areas. Sources such as pest waste and waterfowl congregating at parks, ponds or other attractive nuisance areas are not considered natural.

Screening for PCBs shall be completed by determining turbidity. The turbidity shall be sampled from the outfall and in-stream immediately upstream or otherwise outside the influence of the outfall. The sample may be taken during any rain event that results in a discharge that fulfills the wet weather criteria. If the field turbidity meter reading from the outlet's discharge is more than 5 NTU greater than

the in-stream reading a follow-up investigation needs to be initiated to determine any sources. Upon determining the source(s) a remediation program needs to be implemented.

The screening results of outlets discharging to impaired waters shall be analyzed to determine prioritized Outfall Monitoring. Six outfalls with the highest contribution of each pollutant of concern shall be annually monitored for the appropriate pollutant(s) of concern.

Schedule of Deadlines

Initiate Impaired Waters Outfall Screening -	June 30, 2018
50% Outfalls Screened	June 30, 2020
100% Outfalls Screened	June 30, 2022
Annual Monitoring (six Outfalls)	June 30, 2020

Dry Weather Baseline Outfall/Interconnection Screening and Sampling

All outlets need to be inspected for the presence of dry weather flow. Those outlets in which dry weather flow is observed shall be sampled. The purpose of this sampling is to identify illicit discharges and work to eliminate such discharges. The samples shall be analyzed for the following items: ammonia, chlorine, conductivity, salinity, E-coli, surfactants and temperature.

Based on the findings of the dry weather inspections and a review of other pertinent factors which are identified as increasing the potential for illicit discharges, the outlets will be prioritized by the likelihood and risk of the potential presence of illicit discharges. The general priorities are generally as follows: Dry weather flow to impaired waters, dry weather flow to non-impaired waters, Outlets in areas predominantly in areas serviced by subsurface septic systems beginning with non-residential uses, wet weather flows to impaired waters and all other outlets.

Sampling of dry weather flows will be scheduled in accordance to the potential risk of illicit discharges as describe above.

Schedule of Deadlines

Initiate Dry Weather Sampling – no later than October 1, 2018
All Sampling Complete – June 30, 2020

Wet Weather Outfall Sampling

All outlets shall have at least one (1) wet weather sample collected for analyzed for the following items: Ammonia, chlorine, conductivity, salinity, E-coli, surfactants and temperature. Samples must occur during or after a storm event of sufficient quantity or intensity to produce stormwater discharge at the outlet. Sampling if possible should occur during periods when ground water levels are relatively high, March through June ideally.

Based on the findings of the dry weather inspections and a review of other pertinent factors which are identified as increasing the potential for illicit discharges, wet weather outfall sampling will be prioritized by the likelihood and risk of the potential presence of illicit discharges. Wet weather sampling will be generally prioritized as follows: outlets to impaired waters, outlets in areas serviced by subsurface septic disposal, industrial areas, commercial areas and residential areas.

Schedule of Deadlines

All outlet Sample prior to the Permit Expiration Date – June 30, 2022

Confirmatory Outfall Screening

A confirmatory outfall screening shall be completed within one (1) calendar year of the removal of any illicit discharge and or correction of a sanitary sewer overflow. The confirmatory screening must be conducted during a dry weather condition unless System Vulnerability Factors have been identified in which both dry and wet weather need to be conducted. If the confirmatory screening indicates evidence of additional illicit discharges and or sanitary sewer overflows further investigation and remedies shall be pursued. Confirmatory Outfall Screening shall be analyzed for the following items: ammonia, chlorine, conductivity, salinity, E-coli, surfactants and temperature.

Follow-up Screening

Upon completion of all catchment investigation and illicit discharge removal and confirmatory, each outfall or interconnection shall be re-prioritized for screening and scheduled for ongoing screening within five (5) years. Follow-up screening shall consist of dry weather screening and sampling. Follow-up wet weather screening and sampling shall also be conducted at outfalls where wet weather screening was required due to System Vulnerability factors.

During the past calendar year, the Town of Plainville began the reassessment for the Town's 261 identified drainage outfalls. Outfalls to impaired waters were inspected, photographed and categorized using a simple worksheet, (44 outlets). One hundred and five (105) (total of 149) other outfalls were inspected, photographed and categorized using a simple worksheet. These the total outlets were subdivided into structures with and without dry weather flow. Of all the outlets inspected 37 were determined to have dry weather flow. Outfalls with dry weather flow were identified as the highest priority screening sites with outfalls to impaired water receiving the highest priority.

The System Vulnerability Factors were examined. These factors included: history of sanitary sewer overflows, common or twin invert storm and sanitary sewer alignments, common trench alignment, crossing of storm and sanitary sewers alignment with sanitary sewers constructed above the drainage facilities, sanitary sewers constructed in conjunction with underdrains, inadequate sanitary sewer service and areas serviced by septic systems. Of the factors only two were deemed appropriate for consideration, crossing storm and sanitary sewers and areas serviced by septic systems. Dry weather screening appears the most appropriate sampling protocol to determine whether illicit discharges are occurring in these locations. Upon the completion, of the outlet inspections, as-built construction plans for drainage and sewer plans be reviewed to determine the locations of crossing storm and sanitary sewers and outfalls in areas where septic system prevalent. Additionally wet weather screening will be completed.

Screening/Monitoring 2018 Goals

During the upcoming calendar year it is planned to complete the reassessment of the remaining 115± outfalls. Additionally, it is planned to begin screening the dry weather flow outfall locations. The goal at the present time would be to screen approximately 50% of those locations identified as have dry

weather flow. Should the results indicate illicit discharges, preliminary investigation of their source shall be initiated.

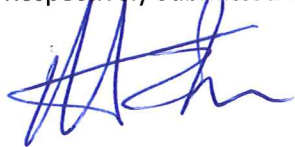
Impaired Waters Investigation and Monitoring Program

Target Date	Activity	Responsible Department
June 2018	Assessment and Priority Ranking of Catchment Data	Technical Services – Goal for 2018 is to prioritize the outlets by potential risk of illicit discharges
October 2018	Initiate Dry Weather Sampling	Technical Services – Goal for 2018 is to complete the initial inspection and screen approximately 50% of the identified dry weather flow locations
June 2020	Dry Weather Sampling Complete	Technical Services
June 2022	Wet Weather Sampling Complete (each outlet at least one time)	Technical Services
As Warranted	Confirmatory Outfall Screening	Technical Services
As Warranted	Follow-up Screening	Technical Service

Certification

I have personally examined and am familiar with the information submitted in this document and all the 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.

Respectively Submitted By:



Robert E. Lee
Town Manager
May 7, 2018



John R. Bossi
Director of Technical Services
May 7, 2018