

Year 3 Annual Report
Massachusetts Small MS4 General Permit
Reporting Period: July 1, 2020-June 30, 2021

Please DO NOT attach any documents to this form. Instead, attach all requested documents to an email when submitting the form

Unless otherwise noted, all fields are required to be filled out. If a field is left blank, it will be assumed the requirement or task has not been completed. Please ONLY report on activities between July 1, 2020 and June 30, 2021 unless otherwise requested.

Part I: Contact Information

Name of Municipality or Organization:

EPA NPDES Permit Number:

Primary MS4 Program Manager Contact Information

Name: Title:

Street Address Line 1:

Street Address Line 2:

City: State: Zip Code:

Email: Phone Number:

Stormwater Management Program (SWMP) Information

SWMP Location (web address):

Date SWMP was Last Updated:

If the SWMP is not available on the web please provide the physical address:

Part II: Self-Assessment

First, in the box below, select the impairment(s) and/or TMDL(s) that are applicable to your MS4. Make sure you are referring to the most recent EPA approved Section 303(d) Impaired Waters List which can be found here: <https://www.epa.gov/tmdl/region-1-impaired-waters-and-303d-lists-state>

Impairment(s)

Bacteria/Pathogens Chloride Nitrogen Phosphorus
 Solids/ Oil/ Grease (Hydrocarbons)/ Metals

TMDL(s)

In State: Assabet River Phosphorus Bacteria and Pathogen Cape Cod Nitrogen
 Charles River Watershed Phosphorus Lake and Pond Phosphorus

Out of State: Bacteria/Pathogens Metals Nitrogen Phosphorus

Clear Impairments and TMDLs

Next, check off all requirements below that have been completed. **By checking each box you are certifying that you have completed that permit requirement fully.** If you have not completed a requirement leave the box unchecked. Additional information will be requested in later sections.

Year 3 Requirements

Inspected and screened all outfalls/interconnections (excluding Problem and Excluded outfalls)
 Updated outfall/interconnection priority ranking based on the information collected during the dry weather inspections as necessary
 Post-construction bylaw, ordinance, or other regulatory mechanism was updated and adopted consistent with permit requirements

Optional: If you would like to describe progress made on any incomplete requirements listed above, provide any additional information, and/or if any of the above year 3 requirements could not be completed due to the impacts of COVID-19, please identify the requirement that could not be completed, any actions taken to attempt to complete the requirement, and reason the requirement could not be completed below:

Town of Hudson Planning, Conservation and Public Works staff held several meetings to discuss necessary changes to local land use regulations to meet MS4 General Permit conditions. The Town currently relies on the Massachusetts Stormwater Management Handbook to define performance standards under Planning Board and Conservation Commission jurisdiction. Hudson is anticipating review and revision of its zoning standards and regulations in the fall/winter of 2021 and will consider integration of updated stormwater requirements at that time. Covid-19 impacted some IDDE operations this past permit year, significantly impacting building inspections associated with catchment investigations.

Annual Requirements

Provided an opportunity for public participation in review and implementation of SWMP and complied with State Public Notice requirements
 Kept records relating to the permit available for 5 years and made available to the public

The SSO inventory has been updated, including the status of mitigation and corrective measures implemented

- This is not applicable because we do not have sanitary sewer
- This is not applicable because we did not find any new SSOs
- The updated SSO inventory is attached to the email submission
- The updated SSO inventory can be found at the following website:

Properly stored and disposed of catch basin cleanings and street sweepings so they did not discharge to receiving waters

Provided training to employees involved in IDDE program within the reporting period

All curbed roadways were swept at least once within the reporting period

Updated system map due in year 2 as necessary

Enclosed all road salt storage piles or facilities and implemented winter road maintenance procedures to minimize the use of road salt

Implemented SWPPPs for all permittee owned or operated maintenance garages, public works yards, transfer stations, and other waste handling facilities

Updated inventory of all permittee owned facilities as necessary

O&M programs for all permittee owned facilities have been completed and updated as necessary

Implemented all maintenance procedures for permittee owned facilities in accordance with O&M programs

Implemented program for MS4 infrastructure maintenance to reduce the discharge of pollutants

Inspected all permittee owned treatment structures (excluding catch basins)

Optional: If you would like to describe progress made on any incomplete requirements listed above, provide any additional information, and/or if any of the above annual requirements could not be completed due to the impacts of COVID-19, please identify the requirement that could not be completed, any actions taken to attempt to complete the requirement, and reason the requirement could not be completed below:

Bacteria/ Pathogens (Combination of Impaired Waters Requirements and TMDL Requirements as Applicable)

Annual Requirements

*Public Education and Outreach**

Annual message was distributed encouraging the proper management of pet waste, including noting any existing ordinances where appropriate

Permittee or its agents disseminated educational material to dog owners at the time of issuance or renewal of dog license, or other appropriate time

Provided information to owners of septic systems about proper maintenance in any catchment that discharges to a water body impaired for bacteria

** Public education messages can be combined with other public education requirements as applicable (see Appendix H and F for more information)*

Optional: If you would like to describe progress made on any incomplete requirements listed above or provide any additional details, please use the box below:

The Town of Hudson does post a flyer on pet waste management on the Town's website, but was unable to advance a standard approach to distribute educational materials to dog owners during the renewal of dog licensing due to the effects of COVID-19 on the Town Clerks office. It is anticipated that brochures will be made available to dog license holders in Permit Year 4.

Phosphorus (Combination of Impaired Waters Requirements and TMDL Requirements as Applicable)

Annual Requirements

*Public Education and Outreach**

- Distributed an annual message in the spring (April/May) encouraging the proper use and disposal of grass clippings and encouraging the proper use of slow-release and phosphorus-free fertilizers
- Distributed an annual message in the summer (June/July) encouraging the proper management of pet waste, including noting any existing ordinances where appropriate
- Distributed an annual message in the fall (August/September/October) encouraging the proper disposal of leaf litter

** Public education messages can be combined with other public education requirements as applicable (see Appendix H and F for more information)*

Good Housekeeping and Pollution Prevention for Permittee Owned Operations

- Increased street sweeping frequency of all municipal owned streets and parking lots subject to Permit part 2.3.7.a.iii.(c) to a minimum of two times per year (spring and fall)

Potential structural BMPs

Any structural BMPs already existing or installed in the regulated area by the permittee or its agents

- was tracked and the phosphorus removal by the BMP was estimated consistent with Attachment 3 to Appendix F. The BMP type, total area treated by the BMP, the design storage volume of the BMP and the estimated phosphorus removed in mass per year by the BMP were documented.

- The BMP information is attached to the email submission
- The BMP information can be found at the following website:

Not applicable in Permit Year 3. To be considered during stormwater retrofit inventory and phosphorus control planning in Permit Year 4.

Optional: If you would like to describe progress made on any incomplete requirements listed above or provide any additional details, please use the box below:

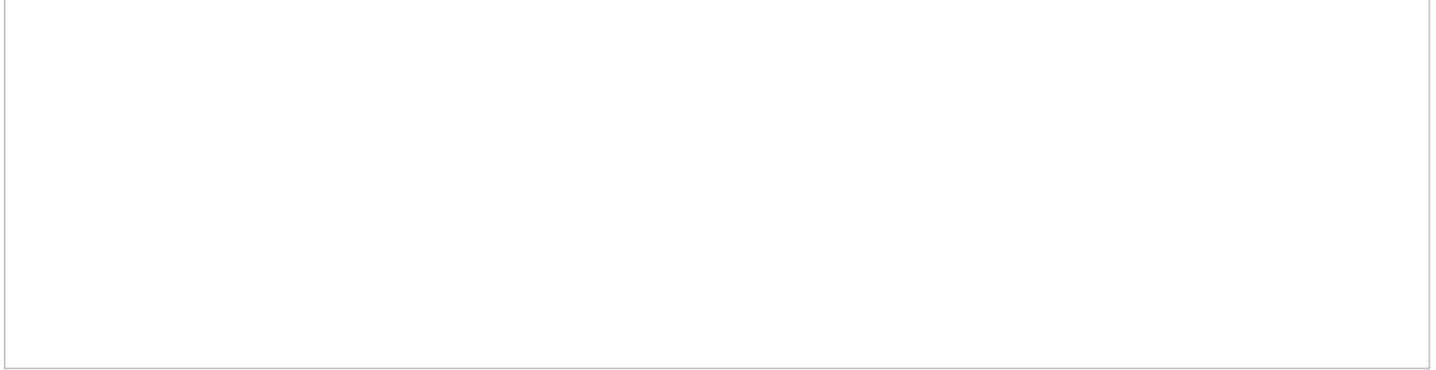
Lake and Pond Phosphorus TMDL

- Completed the funding source assessment

Optional: If you would like to describe progress made on any incomplete requirements listed above or provide any additional details, please use the box below:

In Permit Year 3, a legal and funding analysis identified existing regulatory and funding mechanisms available to the Town of Hudson and described any changes to regulatory mechanisms and/or local policy that may be necessary to effectively implement the entire LPCP.

Optional: Use the box below to provide any additional information you would like to share as part of your self-assessment:

A large, empty rectangular box with a thin black border, intended for the user to provide additional information as part of their self-assessment.

Part III: Receiving Waters/Impaired Waters/TMDL

Have you made any changes to your lists of receiving waters, outfalls, or impairments since the NOI was submitted?

- Yes
- No

If yes, describe below, including any relevant impairments or TMDLs:

Part IV: Minimum Control Measures

Please fill out all of the metrics below. If applicable, include in the description who completed the task if completed by a third party.

MCM1: Public Education

Number of educational messages completed **during this reporting period:** 6

*Below, report on the educational messages completed **during this reporting period**. For the measurable goal(s) please describe the method/measures used to assess the overall effectiveness of the educational program.*

BMP: Targeted Message - Clean Water Commitment

Message Description and Distribution Method:

The Town of Hudson posted their clean water commitment handout to their website. The handout discusses the Towns ongoing sewer and drainage system investigations to improve waterways. The handout includes information on how drainage systems function and gives an overview of the Town's system. The second page of the handout includes a section on what residents can do to prevent stormwater runoff pollution. It also includes a summary of the work the Town has done over the last 12 months to improve water quality in streams, ponds, and rivers.

Targeted Audience: Residents, Industrial Facilities, Developers, Businesses

Responsible Department/Parties: DPW Operations

Measurable Goal(s):

General Awareness for target audiences: Educate residents on work being done to improve water quality connected to storm drains and educate them on what they can do to help.

Message Date(s): On-going

Message Completed for: Appendix F Requirements Appendix H Requirements

Was this message different than what was proposed in your NOI? Yes No

If yes, describe why the change was made:

Additional educational content has been posted as needed to address outreach priorities in any given year. This is an additional outreach effort beyond that described in the SWMP.

BMP: Supplemental Message - Grass Clipping Management

Message Description and Distribution Method:

The Town of Hudson posted an educational flyer about how to properly manage grass clippings. The flyer includes three images with messages relaying that if not disposed of correctly, grass clippings can end up in storm drains leading to rivers and other waterways. The flyer also states how grass clippings can have negative effects on waterways such as increasing nitrogen and leading to algae blooms.

The Towns DPW Facebook page has 1,290 followers that see their posts on their news feeds. This post got 9

likes and 2 shares.

Targeted Audience: Residents

Responsible Department/Parties: DPW Operations

Measurable Goal(s):

Supplemental message for water quality impaired waterways.

Message Date(s): 6/02/2021

Message Completed for: Appendix F Requirements Appendix H Requirements

Was this message different than what was proposed in your NOI? Yes No

If yes, describe why the change was made:

BMP: Supplemental Message - Clearing Leaves from Storm Drains

Message Description and Distribution Method:

This educational flyer was posted on Facebook to motivate residents to help clean leaves from storm drains. The post lets people know that leaves can clog storm drains and that the nutrients in leaves can harm rivers. The end of the flyer requests residents not to rake leaves into the streets.

The Towns DPW Facebook page has 1,290 followers that see their posts on their news feeds. This post got 6 likes and 5 shares.

Targeted Audience: Residents

Responsible Department/Parties: DPW Operations

Measurable Goal(s):

Supplemental message for water quality impaired waterways.

Message Date(s): 10/21/2021

Message Completed for: Appendix F Requirements Appendix H Requirements

Was this message different than what was proposed in your NOI? Yes No

If yes, describe why the change was made:

BMP: Supplemental Message - Septic Systems

Message Description and Distribution Method:

Posted on the Town of Hudson's website is a graphic demonstrating how the septic system works. Included on the graphic are tips on how to best use your septic system. At the bottom of the graphic are 5 signs your tank need maintenance.

Targeted Audience: Residents

Responsible Department/Parties: DPW Operations

Measurable Goal(s):

Supplemental message for water quality impaired waterways.

Message Date(s): On-going

Message Completed for: Appendix F Requirements Appendix H Requirements

Was this message different than what was proposed in your NOI? Yes No

If yes, describe why the change was made:

BMP: Supplemental Message - Pet Waste Cleaning**Message Description and Distribution Method:**

Posted on the Town's website is a flyer calling for people to clean up after their pets. The flyer explains the impact pet waste can have when it washes into storm drain and eventually waterways, polluting them.

Targeted Audience: Residents

Responsible Department/Parties: DPW Operations

Measurable Goal(s):

Supplemental message for water quality impaired waterways.

Message Date(s): On-going

Message Completed for: Appendix F Requirements Appendix H Requirements

Was this message different than what was proposed in your NOI? Yes No

If yes, describe why the change was made:

BMP: Supplemental Message - Proper Fertilizer Use

Message Description and Distribution Method:

The Town posted a flyer about fertilizer on their website. The post explains that fertilizer doesn't just go to your lawn and that it gets washed into storm drains and into local waterways. It goes on to inform readers that fertilizers can harm fish and wildlife in rivers, ponds, and streams.

Targeted Audience: Residents

Responsible Department/Parties: DPW Operations

Measurable Goal(s):

Supplemental message for water quality impaired waterways.

Message Date(s): On-going

Message Completed for: Appendix F Requirements Appendix H Requirements

Was this message different than what was proposed in your NOI? Yes No

If yes, describe why the change was made:

BMP:[Message name here]

Message Description and Distribution Method:

Targeted Audience:

Responsible Department/Parties:

Measurable Goal(s):

Message Date(s):

Message Completed for: Appendix F Requirements Appendix H Requirements

Was this message different than what was proposed in your NOI? Yes No

If yes, describe why the change was made:

Add an Educational Message

MCM2: Public Participation

Describe the opportunity provided for public involvement in the development of the Stormwater Management Program (SWMP) **during this reporting period**:

The Town of Hudson had their SWMP available at the Department of Public Works and on their website for public viewing and commentary.

Was this opportunity different than what was proposed in your NOI? Yes No

Describe any other public involvement or participation opportunities conducted **during this reporting period**:

MCM3: Illicit Discharge Detection and Elimination (IDDE)

Sanitary Sewer Overflows (SSOs)

Check off the box below if the statement is true.

This SSO section is NOT applicable because we DO NOT have sanitary sewer

*Below, report on the number of SSOs identified in the MS4 system and removed **during this reporting period**.*

Number of SSOs identified:

Number of SSOs removed:

MS4 System Mapping

Optional: Provide additional status information regarding your map:

Hudson continues to refine and revise their storm sewer system infrastructure attributes/map. Consistent with the Town's operations programs, staff conduct mapping refinements during capital improvement projects, catch basin and storm sewer cleaning, CCTV inspections and/or other field efforts.

Screening of Outfalls/Interconnections

If conducted, please submit any outfall monitoring results from this reporting period. Outfall monitoring results should include the date, outfall/interconnection identifier, location, weather conditions at time of sampling, precipitation in previous 48 hours, field screening parameter results, and results from all analyses. Please also include the updated inventory and ranking of outfalls/interconnections based on monitoring results.

- No outfalls were inspected
- The outfall screening data is attached to the email submission
- The outfall screening data can be found at the following website:

*Below, report on the number of outfalls/interconnections screened **during this reporting period**.*

Number of outfalls screened:

*Below, report on the percent of outfalls/interconnections screened **to date**.*

Percent of outfalls screened:

Optional: Provide additional information regarding your outfall/interconnection screening:

The remaining 119 outfalls were inspected in January and February of 2020.

Catchment Investigations

If conducted, please submit all data collected during this reporting period as part of the dry and wet weather investigations. Also include the presence or absence of System Vulnerability Factors for each catchment.

- No catchment investigations were conducted
- The catchment investigation data is attached to the email submission
- The catchment investigation data can be found at the following website:

*Below, report on the number of catchment investigations completed **during this reporting period**.*

Number of catchment investigations completed this reporting period:

*Below, report on the percent of catchments investigated **to date**.*

Percent of total catchments investigated:

Optional: Provide any additional information for clarity regarding the catchment investigations below:

Catchment investigation procedures have been initiated in Permit Year 3 in Hudson with reporting to be completed in Permit Year 4. Updates to IDDE priorities have been addressed and are being incorporated into catchment investigation planning.

IDDE Progress

If illicit discharges were found, please submit a document describing work conducted over this reporting period, and cumulative to date, including location source; description of the discharge; method of discovery; date of discovery; and date of elimination, mitigation, or enforcement OR planned corrective measures and schedule of removal.

- No illicit discharges were found
- The illicit discharge removal report is attached to the email submission
- The illicit discharge removal report can be found at the following website:

*Below, report on the number of illicit discharges identified and removed, along with the volume of sewage removed **during this reporting period**.*

Number of illicit discharges identified:

Number of illicit discharges removed:

Estimated volume of sewage removed: gallons/day

*Below, report on the total number of illicit discharges identified and removed to date. At a minimum, report on the number of illicit discharges identified and removed **since the effective date of the permit (July 1, 2018)**.*

Total number of illicit discharges identified:

Total number of illicit discharges removed:

Optional: Provide any additional information for clarity regarding illicit discharges identified, removed, or planned to be removed below:

Employee Training

Describe the frequency and type of employee training conducted **during this reporting period**:

The Town of Hudson underwent Pollution Prevention and Good Housekeeping training and Illicit Discharge Detection Elimination training in April of 2021. Department of Public Works and Transfer Station Stormwater Pollution Prevention Plan training was conducted in June of 2021.

MCM4: Construction Site Stormwater Runoff Control

*Below, report on the construction site plan reviews, inspections, and enforcement actions completed **during this reporting period**.*

Number of site plan reviews completed:

Number of inspections completed:

Number of enforcement actions taken:

Optional: Enter any additional information relevant to construction site plan reviews, inspections, and enforcement actions:

Three site inspections were completed by the Town's Planning Board Peer review consultant to inspect erosion control, and one was by the Conservation Agent to inspect erosion control.

MCM5: Post-Construction Stormwater Management in New Development and Redevelopment

As-built Drawings

*Below, report on the number of as-built drawings received **during this reporting period**.*

Number of as-built drawings received:

Optional: Enter any additional information relevant to the submission of as-built drawings:

Street Design and Parking Lots Report

Describe the status of the street design and parking lots assessment due in year 4 of the permit term, including any planned or completed changes to local regulations and guidelines:

Not applicable in Permit Year 3. To be considered during Permit Year 4.

Green Infrastructure Report

Describe the status of the green infrastructure report due in year 4 of the permit term, including the findings and progress towards making the practice allowable:

Not applicable in Permit Year 3. To be considered during Permit Year 4.

Retrofit Properties Inventory

Describe the status of the inventory, due in year 4 of the permit term, of permittee-owned properties that could be modified or retrofitted with BMPs to mitigate impervious areas and report on any properties that have been modified or retrofitted:

Not applicable in Permit Year 3. To be considered during Permit Year 4.

MCM6: Good Housekeeping

Catch Basin Cleaning

*Below, report on the number of catch basins inspected and cleaned, along with the total volume of material removed from the catch basins **during this reporting period**.*

Number of catch basins inspected: 2,100

Number of catch basins cleaned: 2,070

Total volume or mass of material removed from all catch basins: 985 tons

Below, report on the total number of catch basins in the MS4 system.

Total number of catch basins: 3,400

If applicable:

Report on the actions taken if a catch basin sump is more than 50% full during two consecutive routine inspections/cleaning events:

If necessary, schedule adjustments will be made to prioritize catch basins located at known problem areas (low spots) and near construction activities. If inspections and maintenance activities indicate excessive sediment and debris loading (i.e. the sump is more than 50% full during two consecutive routine inspections/cleanings), these catch basins will be marked for more frequent cleaning.

Street Sweeping

*Report on street sweeping completed **during this reporting period** using one of the three metrics below.*

Number of miles cleaned: 103.14

Volume of material removed: [Select Units]

Weight of material removed: [Select Units]

Stormwater Pollution Prevention Plan (SWPPP)

*Below, report on the number of site inspections for facilities that require a SWPPP completed **during this reporting period**.*

Number of site inspections completed: 1

Describe any corrective actions taken at a facility with a SWPPP:

Additional Information

Monitoring or Study Results

Results from any other stormwater or receiving water quality monitoring or studies conducted during the reporting period not otherwise mentioned above, where the data is being used to inform permit compliance or permit effectiveness must be attached.

- Not applicable
- The results from additional reports or studies are attached to the email submission
- The results from additional reports or studies can be found at the following website(s):

If such monitoring or studies were conducted on your behalf or if monitoring or studies conducted by other entities were reported to you, a brief description of the type of information gathered or received shall be described below:

Additional Information

Optional: Enter any additional information relevant to your stormwater management program implementation during the reporting period. Include any BMP modifications made by the MS4 if not already discussed above:

COVID-19 Impacts

Optional: If any of the above year 3 requirements could not be completed due to the impacts of COVID-19, please identify the requirement that could not be completed, any actions taken to attempt to complete the requirement, and reason the requirement could not be completed below:

Activities Planned for Next Reporting Period

Please confirm that your SWMP has been, or will be, updated to comply with all applicable permit requirements including but not limited to the year 4 requirements summarized below. (Note: impaired waters and TMDL requirements are not listed below)

Yes, I agree

- Develop a report assessing current street design and parking lot guidelines and other local requirements within the municipality that affect the creation of impervious cover
- Develop a report assessing existing local regulations to determine the feasibility of making green infrastructure practices allowable when appropriate site conditions exist
- Identify a minimum of 5 permittee-owned properties that could potentially be modified or retrofitted with BMPs to reduce impervious areas

Annual Requirements

- Annual report submitted and available to the public
- Annual opportunity for public participation in review and implementation of SWMP
- Keep records relating to the permit available for 5 years and make available to the public
- Properly store and dispose of catch basin cleanings and street sweepings so they do not discharge to receiving waters
- Annual training to employees involved in IDDE program
- Update inventory of all known locations where SSOs have discharged to the MS4
- Continue public education and outreach program
- Update outfall and interconnection inventory and priority ranking and include data collected in connection with the dry weather screening and other relevant inspections conducted
- Implement IDDE program
- Review site plans of construction sites as part of the construction stormwater runoff control program
- Conduct site inspection of construction sites as necessary
- Inspect and maintain stormwater treatment structures
- Log catch basins cleaned or inspected
- Sweep all curbed streets at least annually
- Continue investigations of catchments associated with Problem Outfalls
- Implemented SWPPPs for all permittee owned or operated maintenance garages, public works yards, transfer stations, and other waste handling facilities
- Review inventory of all permittee owned facilities in the categories of parks and open space, buildings and facilities, and vehicles and equipment; update if necessary
- Review O&M programs for all permittee owned facilities; update if necessary
- Implement all maintenance procedures for permittee owned facilities in accordance with O&M programs
- Implement program for MS4 infrastructure maintenance to reduce the discharge of pollutants
- Enclose all road salt storage piles or facilities and implemented winter road maintenance procedures to minimize the use of road salt
- Review as-built drawings for new and redevelopment to ensure compliance with post construction bylaws, regulations, or regulatory mechanism consistent with permit requirements
- Inspect all permittee owned treatment structures (excluding catch basins)

Provide any additional details on activities planned for permit year 4 below:



Part V: Certification of Small MS4 Annual Report 2021

40 CFR 144.32(d) Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, I certify that the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

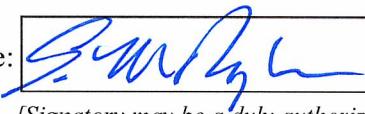
Name:



Title:



Signature:



Date:



*[Signatory may be a duly authorized
representative]*